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ABSTRACT

This resource unit was prepared as guide for career orientation in Grades ~~7~~ and 8 to be used by all teachers of all subjects in planning and implementing career orientation activities. The unit is designed to give students a broad knowledge of the characteristics and functions of specific occupations within a spectrum of occupational families. Student participation should be encouraged at this level so that each student will develop a positive self-concept in relation to the many and varied roles within the occupational framework of our economic and social system. Teaching strategies, correlation of subjects, learning activities, resource materials, evaluation techniques, and questionnaires are presented for teacher utilization. More than half of the document consists of a resource bibliography on various types of materials and of a listing of clusters in various occupations as a guide for the classroom teacher. Related documents, available in this issue, are VT 019 862, VT 019 877, and VT 019 879. (MF)

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Volume II of Volume I

LINCOLN COUNTY EXEMPLARY PROGRAM

IN

VOCATIONAL EDUCATION

Using The

Occupational Clusters

In

Career Orientation

Resource Unit

For

Levels Seven and Eight

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A Suggestive Resource Unit

For

Levels Seven and Eight

Using The

Occupational Clusters

In

Career Orientation

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Preface

This resource unit was prepared by the Exemplary Project Staff as a guide for Career Orientation. It was specifically written for levels seven and eight. This unit is to be used as a source of information for all teachers of all subjects (art, science, English, geography, history, literature, mathematics, music, physical education and others).

This resource unit should be read completely by all educators involved in the career orientation venture prior to planning and implementing Career Orientation Activities.

I. Synopsis

The seventh and eighth grade level of Career Orientation are designed to give students a broad knowledge of the characteristics and functions, as well as, the duties and rewards of specific occupations within a broad spectrum of occupational families. Students at this age level have specific characteristics which suggest certain needs and motivations. Students at this level should have the opportunity to explore their capabilities in various areas under a variety of situations. Therefore, they need the opportunity to self-appraise their emerging potential and to analyze occupational information for decision making. The students need to understand the necessity of all types of occupations and to learn the educational and occupational requirements of the many different vocations within a broad framework of the overall occupational cluster.

Students involvement and participation should be encouraged at this level so that each student will develop a positive self-concept in relation to the many and varied roles that lie within the occupational framework of our economic and social system.

Mental and vocational maturation of each individual student should be analyzed so that total participation of

all students can be based on an individualized approach that will insure meaningful learning for all the students so that their needs and goals can be met later in life.

Students at this level should gain a deeper insight of how the clusters interlink so that they can function productively in a technological environment.

All activities or learning situations should seek to emphasize the value of the individual in any economic system so long as he, the worker, performs occupational services which demonstrate the dignity of man by contributing to the total worth of society.

II. Staff Involvement

Administrator: To implement Career Orientation effectively, it must be fully endorsed from the highest level of school administration of the system as well as possess the full commitment and support of the school building administrator. In the leadership role, the county superintendent has endorsed and supported fully the efforts of all persons involved in the implementation of Career Education within the Lincoln County School System. The school building principal or administrator has an excellent opportunity to effect change, influence and strengthen the curriculum and to serve the needs of the students of his particular school. His demonstration of optimism, enthusiasm, support, and involvement are of uttermost important as a key element in the overall concept of Career Orientation.

Teacher: The junior high school teacher or instructor plays a vital role in each student's maturation and skill development. The classroom teacher must take this responsibility seriously and help each student in the development of his individual career goal. The teacher is more specialized in regard to his particular subject area and should therefore be more familiar with the wide range of occupations within that particular field of study. The classroom teacher or instructor should be cognizant that he is very influential in the student's evaluation of a particular occupation; therefore, as a classroom teacher he must take extreme professional care and jurisprudence in presenting occupational information so that no value judgements or biases are interjected into the learning experience.

Career Orientation is only as successful as the teacher who is personally motivated and involved in this approach to relevant education. Good ideas come from the classroom teacher who demonstrated enthusiasm and support for the total Career Orientation concept. Without these ingredients, student growth and program content are certainly going to be weak in the area of career education. Thus, when evaluating, the teacher who is involved must analyze his procedures of implementation and ascertain whether the experiences were relevant in providing meaningful learning experiences in career orientation.

III. Student Involvement

Career Orientation should provide all students with relevant, meaningful and exciting learning experiences through student centered activities. These activities, which will stimulate the student's individuality, initiative, and curiosity emerge in the form of vicarious simulated and hands-on experiences in many different ways and forms to each individual student.

Each student should be urged by the individual classroom teacher to participate in each learning activity as much as his mental abilities and aptitudes will permit so that he may perform as a contributing member of the classroom and therefore learn how to contribute as a worthwhile member of society.

Vicarious Experiences: Each student in the classroom can profit greatly from occupational literature, books, films, filmstrips, and other types of learning materials. These audio-visual materials enable the student to learn about various occupations without actually observing or performing the actual job task. These type of experiences are valuable tools for individual or group activities which will broaden the exposure of the student's occupational knowledge in areas where it is impossible for them to gain simulated or hands-on experiences.

Simulated Experiences: Career Orientation is an effort to reinforce the student's interest in a particular

career area. These experiences involving mock job situations and/or job tasks which can be incorporated into Career Orientation under the direction of the classroom teacher. These experiences can provide the student with real sensations in a non-real setting, thus allowing each of the students in the classroom to become mentally, physically and emotionally involved without permanent results or a permanent decision after becoming involved in only one simulated experiences in different occupations the student will automatically begin selecting those experiences in which he is best suited and which he excells. This will cause the student to become more activately involved in decision-making concerning his potential career after having the opportunity to be involved in role playing activities.

Hands-On Experiences: The more each student becomes involved in doing, rather than discussing, the less the need will be for concern by the classroom teacher about student motivation. Actual experiences of on-the-job work situations will provide valuable criteria by which the individual student can put his interests and abilities into practice. Each student in the classroom should participate in the field experiences to his maximum ability.

IV. General Objective

To establish in grade seven and eight a curriculum which will assist the student acquire knowledge of the characteristics, functions, duties, and rewards of the occupational families.

To establish in grades seven and eight a curriculum which will assist the student to identify his likes, dislikes, needs, fears, abilities, and aptitudes as they relate to occupational families.

V. Specific Process Objectives

1. To give students an understanding of the knowledge and skills basic to the broad spectrum of the occupational families.
2. To provide the student with a guide to educational and occupational requirements of different jobs.
3. To assist the student in acquiring a technique of analysis of occupational information and to analyze such information before making a tentative choice.
4. To provide experiences, habits, and attitudes which develop successful and continued employment.
5. To provide students with experiences designed to develop the self and self-realization that lead to the selection of an appropriate career which reflects a realistic aspiration level.

VI. Behavioral Product Objectives

1. To display a knowledge of different occupational skills within the various occupational cluster.
2. To utilize knowledge of different occupational skills as they relate to the world of work to make tentative decisions.

3. To synthesize requirements relating to the different occupational clusters pertaining to the comprehensive world of work.
4. To evaluate the many occupational clusters in terms of the needs and goals of the individual student and recognize the need to prepare himself for the world of work.

VII. Teaching Strategies

1. The individual student should become involved with each occupation found in the occupational cluster.
 - A. Individual students could make a scrapbook of the occupations within the occupational cluster.
 - B. Workable model of the occupational cluster as it relates to the individual student.
 - C. A structural dramatization by the entire class dealing with the occupational cluster.
2. Use a sequence of transparencies to point out major geographic areas where occupations in the cluster are located.
 - A. Local
 - B. State
 - C. National
 - D. World

Note: Different kinds of symbols should be used to identify the different types

of occupations as they relate to the different occupational cluster.

3. Develop a series of occupational brochures and posters portraying the different occupations that have been studied within the occupational cluster.

Note: This activity could be done on an individualized basis or by students working together in a group.

4. A committee selected by the students could construct audio-visual aids which would show occupations as they relate to the various cluster within the occupational cluster. These aids would also show the skills needed to perform effectively in the given occupation.

Note: This can be done effectively in a number of ways. Skills and requirements should be stressed which are needed by the employee to function productively in his chosen occupation. The dignity of man regardless of his occupation should be stressed as he performs a useful role in overall development of the world of work.

- A. Bulletin Boards.
- B. Charts
- C. Graphs

- D. Newspapers
 - E. Murals
 - F. Poster
 - G. Television pts
 - H. Games
 - I. Etc.
5. Students should be able to compare the different occupational aspects of the world of work as they relate to the occupational cluster in which they are studying.
- A. Economic Trends
 - B. Labor Trends
 - C. Transportation Trends
 - D. Future Needs or Trends
6. Group presentation of materials and information gathered as the students studies the occupation within the occupational cluster.
- A. Written Reports
 - B. Speeches
 - C. Oral Reports
 - D. Panel Discussions
 - E. Debates
 - F. Role Playing
7. Plan field trips to various occupations that would cover a wide range or variety of occupations within a given cluster and/or a correlation of different occupational clusters.

8. Invite outside speakers to come to the class to discuss their role or job duties that they perform within the occupation. The outside speaker should be one who would cover a wide spectrum within the occupational cluster. Speakers should be able to demonstrate the competencies needed to perform effectively within the occupation.
9. Students should gain broader insights of the occupations within the clusters which would enable them to begin preparation for the type of employment he may be considering as a vocation.
 - A. Analysis should be used extensively in this phase of individual development.
 - B. Job interviews
 - C. Salaries
 - D. Working conditions
 - E. Advancement procedures
 - F. Growth of the company, industry, or corporation
 - G. Security to the individual by being in this type of employment.
10. Appropriate films, filmstrips, slides, or movies showing different types of occupations as they relate to the occupational cluster.
 - A. Films, filmstrips, or other audio-visual aids should be selected based on the interest of the students as it relates to the cluster being studied.

- B. Follow-up study of each audio-visual aid with the possibility of individual growth in some phase of occupational knowledge.
 - C. Students should be encouraged to do individual research projects concerning different types of occupations as they relate to the occupational cluster.
11. Individual students should be able to compile a questionnaire concerning the major requirements of some of the different occupations as they relate to values, characteristics and attitudes connected with different types of careers.

Note: Many different aspects should be considered in the overall questionnaire of job and occupational readiness.

- A. Abilities Needed
- B. Educational Training
 - 1. Elementary
 - 2. Secondary
 - 3. Vocational
 - 4. Post-Secondary Technical Training
 - 5. College
- C. Physical Skills
 - 1. Manual Dexterity
 - 2. Motor
- D. Mental Skills

1. Trainability
2. Communication Skills

E. Sensory Preception

1. Sight
2. Hearing

F. Working conditions as they relate to the individuals suitability for a particular area of career involvement.

1. Inside
2. Outside
3. Physical Demands
4. Aptitude
5. Hazards

G. Importance of different types of occupations as related to the inter-dependence of nations.

1. National priorities.
2. Self-satisfaction in the economic well being of the individual.
3. National goals as related to the economic well being of the cluster.
4. The overall effects that clusters have upon each other.

12. To be able to describe various types of occupations as related to the geographical location of the country.

- A. Cold Climate
- B. Hot Climate

- C. Wet Climate
 - D. Dry Climate
13. Self-Awareness and Personal Growth of All Students Should be Stressed

Teachers and Counselors should collaborate to help students begin to focus systematically and comprehensively upon the dimensions of self-awareness and personal growth as these affect and are affected by their exposure to the concepts, ideas, practices and realities of the world of work. These areas should be dealt with in a general fashion in the classroom setting by the teacher and/or counselor, and in a more indepth manner in counseling groups and in individual sessions. Of specific importance in the interpersonal interpersonal realm might be listed such areas as:

- A. A developing and strengthened sense of the importance of useful work in our society, and a corresponding respect for all those who perform such work, as well as insight into contemporary trends in the development of new and innovative concepts of the work ethic.
- B. The necessity for effective cooperation, collaboration, and communication with others in any meaningful human endeavor, whether

work or non-work, with particular attention to factors facilitating and hindering teamwork and task completion.

- C. The diverse life styles, values, and roles associated with the many different occupations in our society, and an increased ability to accept the validity of a variety of styles without hostility and alienation.
- D. The need for effective problem solving procedures, sound planning and personal involvement in the decision making processes of our democratic society and in our role as employees.
- E. A growing understanding of self in terms of one's personal value structure, strengths, likes, dislikes, aptitudes, and abilities as they relate to the development of an individual as a potential worker in a democratic society.

VIII. Correlation of Subjects

Social studies, English, science, math, and related courses are areas which can easily be adapted to the study of occupation. Other subject areas such as music, physical education, and home economics can also be used effectively. Occupations should be studied as they are related in each subject matter area. The language arts program could easily include oral and written reports, role playing,

interviews, stories, poems, riddles, and letter writing. Math should include the relationship to the worker and to the computation skills that they must have in order to obtain, perform, and function in the world of work. Art can be related to the workers in terms of drawing, painting, molding, lettering, etc., providing skills needed to obtain, perform and function effectively in many occupations.

Science can be adapted to show the skills needed to perform successfully in technical and related occupations. Besides the suggestive methodologies, other pertinent or valuable information could be used by the students for gaining deeper and more meaningful insights into the world of work and the dignity of man. The effective and conscientious classroom teacher, by using games, songs, stories, video tapes and general classroom activities of information derived from different field trips can increase the student's critical awareness of their role that they must perform to be effective citizens of our dynamic society in the world of work.

Role playing the different activities at this grade level is an excellent way for the classroom teacher to gain valuable outputs of student behavior in any learning situation. Role playing helps the students internalize work values into their lives. These activities are essentially an occupational preparation, job placement, and job success steps. Role playing may consist of all

these activities and procedures required of an individual who is proficient in vocational skills.

Correlation should be approached in terms of which has taken place in the cluster being studied at that particular time. Students should be able to relate what they have studied during the phase that they are considering at that time. Therefore, evaluation can consist of self-appraisal by each student and the teachers have a valuable tool as to the degree to which the students have attained the expected outcomes or growth during the course of studying the occupational cluster. The success of the student is measured by his understandings, attitudes, appreciations, and skills acquired and displayed during the unit. By doing this, each student has demonstrated his contribution within the occupational cluster and the end product of the unit should be the individual's internalization of his own worth as a productive member of society as the student intergrates all learning into a total unity.

As America progresses in technology and students are better educated to their surrounding environment, they will automatic challenge the relationship of the school curriculum to the work they may be doing in the near future. Natural relationships between basic skills and effective, satisfying work performances can be easily identified for the students in all subjects of the middle

school curriculum and can be intergrated into the existing curriculum by a variety of methods and proceduces.

English

Write a short paragraph describing your present residence as it would appear in an article if you were trying to sell it on the open market.

Careers

Real Estate Agent, Secretary, Writer, Editor, Typesetter, Copywriter, etc.

Health

Interview people within the school neighborhood and convince them to separate their trash and take appropriate recycling items to a collection depot so that the students could resell them at a recycling plant.

Sanitary Engineer, Truck Driver, Public Relations Worker, Bottling Plant Employees, Local Government and Health Officials, Laboratory Technicians, Ecologist, Salesman, Bookkeeper, Environmentalist, Chemist, etc.

Promote safety and a good health campaign for a week or month in the school by having outside speakers and putting posters in prominent places within the school area.

Policeman, Nurse, Safety Engineer, Fire Marshall, Fire Chief, Civil Defense Personnel, Red Cross Personnel, Child Care Specialist, Explosive Technician, Clothing Tester, Automobile Mechanic, Firearms Technician, etc.

Physical Education

Invite members of the school varsity in all areas of competitive sports to discuss with candor to members of the class in an open forum type of arrangement

Pharmacist, Public Health Nurse, County Health Nurse, Physicians, Coach, Physical Education Teacher, Athletic Director, Professional Athlete, Recreation Director,

the effects of drugs, tobacco, and alcohol would have on their maximum performance at an athletic contest. Local medical and health officials could serve as on the spot advisors while reference materials would serve as sources of verification.

Dietitian, Therapist, Mental Hygienist, etc.

Mathematics

Draw a family tree with you and your family at the head. Compare the family size with other members in the classroom. Discuss your role in population control as it would relate to the cost of living.

Demographer, Ecologist, Designer, Artist, Sanitary Engineer, Statistician, Economist, etc.

Using local newspapers, prepare weekly grocery budget for a family as if it were your own family. Be sure to have or plan balanced meals.

Nutritionist, Dietitians, Cost Analyser, Check Out Clerk, Stock Boy, Pricer, Mathematician, Public Health Officials, Merchant, Delivery Boy, Photographer, Writer, Buyer, Editor, etc.

Social Studies

Discuss and describe the effects of the geographical terrain upon the formulation of population centers and transportation.

Factory Worker, Farmer, Businessman, Gradesman, Fisherman, Meteorologist, Construction Worker, Railroader, Traffic Engineer, Safety Engineer, Sanitary Workers, Highway Safety Employees, etc.

Set up a mock trial using a hypothetical situation involving two or more students in the classroom. Students role-play all participants and witnesses.

Judge, State Police, Sheriff, Court Reporter, Attorney, Recorder, Law Clerk, Law Librarian, Physicans, Medical Examiners, Fingerprint Experts, and

witnesses from all areas of occupations, etc.

Science

Using various scientific methods of grafting, investigate the growth adaptation and behavior capabilities of tree, shrub and flower grafts. Tree grafts could be done to hardwood, softwood and fruit trees.

Make a Chart and graph showing how various colors and sounds affect peoples' behavior. This could be done in the classroom.

Tree Surgeon, Horticulturist, Nurseryman, Landscaper, Gardener, Grounds Keeper, Forestry Technician, Tree Farmer, Research Scientist, Farmer, Crop Scientist, Conservationist, etc.

Artist, Interior Decorator, Painter, Sound Technician, Lighting Technician, Electrician, Advertising Agent, Display Worker, Psychologist, Behavioral Scientist, Statistician, Technician, etc.

Home Economics

Collect samples of wood finishes for furniture and woodwork. Plan model home.

Collect samples of material for clothes and furniture. Plan model home.

Plant a herb garden, keep an account of expenses and net return yielded as to gross profit. Identifying consumers as to certain herbs which are used for decorations and for seasoning

Cabinet Maker, Painter, Interior Designer, Interior Decorator, Refinisher, Sander, Floorer, Carpenter, etc.

Seamstress, Interior Designer, Cutter, Fitter, Tailor, Upholsterers, Paperhanger, Fashion Coordinator, Model, etc.

Grocer, Produce Clerk, Caterer, Seller, Bookkeeper, Cashier, Florist, Cook, Chef, Landscaper, Gardener, Homemaker, Waitress, Waiter, etc.

Art

Paint murals for corridors or other prominent places in the school commons

Set up sidewalk art show with art exhibits for sell to the public.

Architect, Painter, Model, Scene Designer, Engrosser, Color Expert, Interior Designer, Art Supplier, etc.

Photographer, Model, Framer, Artist, Display Worker, Salesman, Saleswomen, Advertiser, Sculpture, Kiln Operator, Cartoonist, Display Designer, Wood Burner, etc.

Music

Study ratios in vibration of scale tones in both major and minor keys.

Visit local area State Mental Hospital. Investigate the role that music and dance can perform in helping mentally disturbed patients with a soothing and calming effect. Also visit local mental health center and observe how music would be beneficial in helping those with speech defects overcome their handicap. From this knowledge the students could possibly tape certain types of music or could plan a performance to be given to the patients who are

Arranger, Performer, Composer, Writer, Music Store Operator, Conductor, Director, Singer, Stage, Manager, Sound Technician Musician.

Disc Jockey, Statician, Musician, Singer, Pianist, Organist, Opera Singer, Jazz Player, Physical Therapist, Speech Therapist, Speech Pathologist, Audio Engineer, Sound Technician, etc.

under treatment at
the state hospital.

Other Subjects

Depending upon the
subject and the
classroom teacher
there are many
non expensive ways
to incorporate
Career Orientation
into the middle
school curriculum.

IX. Hands-On-Activities

Hands-on-activities presents a positive approach of career choice activities which indicates individual decision making strategies that could be used to motivate the students. Personnel activities that involve the students relates positive feedback concerning appropriate decision making within the occupational cluster.

Hands-on-activities will provide the students an in-depth understanding and utilization of the information that they must have before they can make an affiliation with any particular occupational cluster. A systematic examination of each activity as a purposive, goal seeking, learning organism is worthwhile to the students if they are to be successful in the world of work.

Students acquire value systems which influence their choices of occupations. When occupational information is given to a student, it is filtered through psychological

sets, attitudes, preconceptions, and defenses. Students in the seventh and eighth grades have limited and questionable information about occupations and are not ready for specific vocational choices. Work has little meaning for them and they have often times developed biases against certain occupational areas. Hands-on-activities will inculcate in the students an awareness of some of the vast numbers of career opportunities within each occupational cluster and will make the students realize the importance of having career goals, not only for self-realization and personal fulfillment, but for vocational success in any field.

Hands-on-activities at the seventh and eighth grades will help the student cope with the knowledge avalanche and to achieve three developmental tasks: (1) organizing one's knowledge of social and physical reality, (2) learning to work well with and in peer groups, (3) becoming an independent person in the world of work.

The role of the classroom teacher during hands-on-activities includes: (1) helping each student to see himself as worthy, (2) helping each student experience success, (3) helping each student to understand the inner functions of the activity so that it is a worthwhile learning experience, (4) helping each student to realize that there is dignity in doing a job well, (5) helping students consider and make decisions regarding the values of work as they interact with each other, (6) helping each student develop an understanding of their own talents, and (7) helping students

make choices from a wide range of occupations that are structured around each occupational cluster.

The Vocational-Technical Center facilities will be utilized in providing seventh and eighth grade students with hands-on-experiences in the following program areas:

- (1) welding which would include gas welding, electric stick welding, oxygen acetylene cutting, inert gas welding, basic blueprint reading, lay out work and fitting,
- (2) building construction and maintenance would include masonry, carpentry, basic electronics, general plumbing, tile setting, and general blue print reading,
- (3) power mechanics would offer hands-on-activities in hydraulics, pneumatics and small engine repair,
- (4) industrial sewing would be tailoring and alteration,
- (5) typing,
- (6) accounting,
- (7) office practice
- (8) office machines,
- (9) duplicating using the off-set machine, duplicating machine, copying machine and memograph machine,
- (10) clerical,
- (11) secretarial,
- (12) medical nursing assistant and medical office practice,
- (13) hotel and motel aides and management which would offer training in housekeeping and decorating,
- (14) commercial food services whereby the student could have hands-on-activities as a short order cook, chef, waitress, waiter, dishwasher, salad maker, and pastry decorator, and
- (15) residential home economics would provide hands-on-activities by providing home nursing, housekeeping, family cooking and budget planning.

During the summer, the Vocational-Technical Center facilities will be utilized to provide a more indepth opportunity for the seventh and eighth grade students. This will broaden their range of vocational experiences by increasing the time spent through actual hands-on-activity experiences.

Through the use of hands-on-activities, the seventh and eighth grade classroom teachers are in the position to strike a balance between the conventional goals of the school and the emerging vocational goals of the students. Students can enjoy learning for its' own sake; and it is in these grades that the students can begin to make some tentative plans for the future by gaining valuable inputs of occupational knowledge through a wide range of activities.

By having hands-on-activities within the various occupational clusters, it will make the students more aware of various occupational opportunities in their preparation for job entry. The student's role in society is determined largely by his work role, thus making hands-on-activities a necessity as they prepare themselves for the world of work by improving their own competencies to the limit of their abilities and interests.

X. Simulation

Simulation utilizes instruction to the student on how to perform different occupations within the occupational cluster. In order to stay abreast of changes in industrial technology and to continue facilitate learning in Career Orientation.

The problem of assisting students to consider vocational educational opportunities is unlimited through the use of simulation within the classroom. Simulation will help the students in their educational and vocational planning; interest them in the orientation of training opportunities, and motivate them to seek information and pursue further training at higher grade levels. At this grade level the student has made or will soon have to make an occupational choice. They usually make it without enough understanding of the prerequisites of the occupation. The student's choice may therefore be made in response to current interests or to parental influence, neither of which may recognize the student's ability or potential to succeed in his occupational goal.

Simulation will help overcome this barrier by helping the student assess his abilities and interest as he performs different roles within different clusters. The careers for which the student is best fitted would be partially determined by his successful achievement during his role in simulation.

Simulation will assist the student in: (1) discovering and understanding economic processes related to work, (2) discovering occupational opportunities and requirements, (3) exploring work opportunities and the performance of work tasks, (4) self-appraisal of vocational interests and aptitudes, (5) exploring educational and other training opportunities, and (6) to utilize the techniques of simulation in designing worthwhile occupational learning experiences.

By using simulation the students will learn how to deal with the changes which they face as they move into senior high school. This will assist them in understanding how to deal with change as an ever-present aspect of life more especially in their chosen occupational area through: (1) understanding the concept of work and the human satisfaction found in work; (2) develop proper attitudes toward work and society as a whole; (3) to understand the economics of the world of work; (4) to develop a broad background of knowledge and understanding of the occupational clusters; (5) become aware of their occupational talents and capitalize on them through simulated and vicarious experiences; and (6) increase their ability to evaluate their own future vocational choices.

The teacher should take into consideration the student's perception of himself and the image of the person he would like to become as he moves through a logical sequence of simulation exercises by instilling within each student a desirable attitude toward the world of work and the dignity of man as they perform a useful service to mankind.

Well planned projects using simulation will give the students a means for self-exploration. Involvement by the student will give him/her the opportunity to assess their abilities, determine their self-concept, and to prepare for initial employment. Simulation affords many opportunities for stressing the importance of personal appearance, developing responsibility, and bringing a student up to employability.

Simulation activities must be flexible to satisfy every student's needs. Planned activities using simulation will: (1) improve self-confidence, (2) provide a wide range of career experiences, and (3) develop a desirable approach to the process of career choices and simulated work experience.

Simulation presents the complex realities of simultaneous interactive processes by motivating students using relevant and realistic problems and to induce more efficient and active comprehension of information. Through the use of simulation students will learn to see the interrelationship of their decisions and how they affect later occupational opportunities. Students will learn what kinds of educational and occupational opportunities are open to individuals with varying sets of personal characteristics which will promote a better understanding of self and their interpersonal relationships with others.

Simulation is a type of decision making whereby the students make decisions within the framework of a simulated occupation. For simulation to have a value in developing vocational knowledge, the decision making must be structured around a model of real life vocational occupations. The aim of a simulated experience is to help the student clarify his own values pertinent to the real world of work and to conceptualize kinds of decisions to be made while performing an occupation.

Simulation activities when used in the classroom will provide motivation and involvement, illustrate future factual

realities, and led to discussion by the students. Simulation in the past has been used by the military, by industry, and by social scientists. Stimulation within the classroom is a recent innovative technique that can be used by the classroom teacher emphasizing the inquiry approach to learning.

Through the use of simulation within the classroom, many educators have discovered the improvement of problem-solving ability, better communication, and an interdisciplinary approach rarely achieved elsewhere.

XI. Evaluation Techniques

Evaluation within the occupational cluster should be a continuous process in which the student is integrating work values into their personal value systems. The classroom teacher can use several reliable methods to gain deeper insights into the overall values that the individual student thinks about himself and about work as they incorporate these into the world of work. These values should have relevance and congenial meaning to his total personal value system. Included in the evaluation are all of those activities and procedures designed to help the students explore the personal meaning and various forms of work and the values that it holds for them.

The process of evaluation will be an ongoing activity which only the classroom teacher can direct. The three basic criteria for an effective evaluation of student involvement should be centered around:

- (1) Structured occupational clusters or job families discussed or studied in a classroom setting.
- (2) Instruments yielding quantitative and/or qualitative measures of cognitive and affective characteristics of occupational clusters of job families.
- (3) Instruments returning comparative profiles of students who are involved in the exploration facets of occupational clusters.

All data compiled from student activities will be used at the teachers discretion to provide reliability and validity of learning inputs of occupational clusters or job families studied in the world of work.

XII. Methods of Evaluation

1. The observation of pupil participation in group discussion as they relate to career orientation or to the cluster being discussed.
2. Observation of pupil participating in activities
 - A. Materials brought to class from outside sources
 - B. Participation in role playing situations
 - C. Oral questioning and answering of questions
 - D. Participation in group discussions
 - E. Participation in occupational debates
 - F. Participation of pupil in interpretive exercises
 - G. Anecdotal records
 - H. Work samples of the students
3. Responsibilities

- A. Responsibilities students had when school started or starting of an occupational cluster.
 - B. Responsibilities students now perform effectively at the closing of the school term or at the closing of an occupational cluster.
 - C. Occupations that students can now observe.
 - D. Occupations that students can now perform within a given occupational cluster.
 - E. Pre and post testing.
4. Mental and Vocational Maturation
- A. Maturation of the student at the beginning of the school term and at the end of the school term in terms of career orientation and development of positive attitudes toward the world of work.
 - B. Attitude and development changes in each student should be easily recognized as they evolve toward their unique form and as they start making or learn how to make a valuable integral contribution toward the world of work.

III. Resource Materials

- | | |
|--------------|--------------------|
| 1. Films | 5. Maps |
| 2. Records | 6. Transparencies |
| 3. Books | 7. Documentaries |
| 4. Magazines | 8. Autobiographies |

- | | |
|-------------------------|-----------------------------|
| 9. Art Supplies | 28. 16 MM Camera |
| 10. Film Strips | 29. Tape Recorder |
| 11. Tapes | 30. Opaque Projector |
| 12. Cassettes | 31. Filmstrip Projector |
| 13. Pamphlets | 32. Charts |
| 14. Pictures | 33. Graphs |
| 15. Slides | 34. Bulletin Boards |
| 16. Bibliographies | 35. Television |
| 17. Interview Technique | 36. Radio |
| Materials | 37. Easels |
| 18. Career Files | 38. Fannel Boards |
| 19. Card Files | 39. Songs |
| 20. Job Application | 40. Ballards |
| Forms | 41. Simulation Kits |
| 21. Newspapers | 42. Poems |
| 22. Role Playing | 43. Encyclopedias |
| Techniques | 44. Briefs |
| 23. Tests | 45. Industrial Publications |
| 24. Games | 46. Globes |
| 25. Research Projects | 47. D. O. T. |
| 26. Slide Projector | 48. Murals |
| 27. Overhead Projector | 49. Ticker Tapes |

XIV. Field Trips

Students in the seventh and eighth grades are eager to explore the outside world as to the different types of occupations and different types of positions in which they might be or have a previous concern about. They are curious at this age level, and field trips to an occupational concern present a first hand opportunity for the students to react and inneract to real-life situations that can only be ascertained in the occupational world. The importance of providing early career occupational orientation cannot be over emphasized due to the mind set patterns of occupational behavior that has been developing before hand. Field trips are an asset to the students in positive occupational mind set goal performances for later development.

The occupational site should be discussed before hand and if possible audio-visual aids explored by the students so that they have some accurate background knowledge about the operations that are performed at the establishment that they are touring. Different types of workers that they might see and meet during the field trip could be discussed in class preceding the field trip because this will aid the student in becoming more aware of the world of work. While on the actual field trip, students should be given an opportunity to examine, question, and explore within a given latitude the facilities and work opportunities that exist within that particular situation.

Discussing and explaining about different careers or career opportunities within the classroom setting will be a prime source of information to the student, but much more can and will be gained from actual on the spot observation.

Prior to a field trip, the students should have a clear understanding of why they are taking the trip. This type of understanding can thwart unforeseeable conclusions that could be questionable to the students comprehension.

Some of the main purposes of a field trip are as follows:

1. Help each student develop an orientation of the many different types of occupations that are preformed in a certain occupational cluster.
2. Help each student develop traits for observing the different types of occupations being performed within that organization that they are visiting.
3. Help each student observing different types of working conditions within that organization.
4. Gives the students a first hand opportunity to observe workers performing in real situations.
5. Gives the students an opportunity to talk and question different workers as they perform their particular occupation.

Certain classroom preparations should be made before finalizing a field trip.

1. Either a committee of students or the classroom teacher should consult with the principal to obtain his permission for the field trip.
2. Classroom teacher and/or a committee of pupils should correspond with the organization where a field trip is planned in securing their permission for them to arrange for a field trip to their organization.
 - a. Arrange the time that it would suit the organization best for the class to visit them.
 - b. Determine the major type of occupations that the students could possibly observe while they are on the tour.
 - c. Discuss background information that the students should know thus making their tour more educational and more meaningful to them as perhaps future employees of this occupational cluster.
3. Make plans for transportation
 - a. What Kind?
 - b. Who will provide it?
 - c. How long will it take?
 - d. What will it cost?
 - e. Will lunch time away from school be involved?
 - f. What to wear and take on the tour?
4. The classroom teacher should obtain a signed statement from the parents of each child allowing

their children to make a field trip for educational purposes.

The classroom teacher and students should plan for activities in the classroom that would culminate with the field trip. Some of these activities are as follows:

1. Stories concerning major occupations in the cluster related to the tour.
2. Picture display showing different workers performing within this particular occupational cluster.
3. Role playing different types of occupations that they would expect to observe being performed while on a field trip.
4. Using different types of audio-visual materials to illustrate this particular occupational cluster.
5. Class discussion in which each student in the class would have something of value to contribute concerning the planned field trip.
6. Student committees should gather career information concerning the occupational cluster and share this information with each member of the class.
 - a. Kind of workers
 - b. Working conditions
 - c. Training of workers
7. Safety precautions should be discussed
 - a. Traveling to and from the place where the field trip is to take place.

b. Most organizations are proud of their safety record; students should understand that they should be very careful and observe safety measures while they are on a tour.

8. Students should understand that they are guests of an organization while they are on a tour. Their attitude and manners should reflect those of a guest.

Post field trip questions should be raised by the classroom teacher to reinforce the occupational aspects of the tour. The purpose of the trip and what the students observed will determine the questions and classroom discussion, etc.

Suggested questions are as follows:

1. What kind of workers did you observe during the tour?
2. What do these workers contribute to the organization that you were touring?
3. What were the workers working conditions and how long was their work day?
4. What skills did the worker need so that they could perform effectively in their occupations?
5. What special training did these workers need prior to and during employment?

The class will want to write thank you notes or letters to the individual, agency, business or organization that they visited on their tour. Further reports, discussions

and other related classroom activities may be planned by the classroom teacher and students if there is interest on the part of the students.

The exemplary staff plans to set up, in advance, resource people to use as needed by the classroom teacher. The staff also intends to plan field trips in conjunction with each unit of study.

XV. Occupational Questionnaire

1. What are the future prospects for an employee in this particular occupation?
2. Is employment in this particular occupation expected to decrease or increase in the future?
3. What are the physical requirements such as height, weight, age, sex, hearing, and vision that an employee should have in this occupation?
4. What personal interest or hobbies would be helpful for the employee to have in entering this occupation?
5. What special skills are required by the employee in entering this occupation?
6. What are the legal requirements that must be fulfilled before an employee can be hired in this occupation?
7. What tools, equipment, and supplies must be furnished by the employee in this occupation?
8. What kind of educational and or vocational training must be taken by the employee to meet the employer standards or certification before they can be employed?

9. How long does it take and what does it include to meet employer standards or certification in this occupation?
10. If this is a union position, what would be the requirements that you as an employee must meet before you can join or belong to a union?
11. What provisions are made by the employer for on the job training for the employee?
12. What type of occupational experience must an employee have before he can enter this occupation or profession?
13. In this position, can an employee advance and if so, how far?
14. In preparing for this position as an employee, what related positions would you also be preparing for?
15. What are the average yearly earnings for a beginner and experienced employee in this position?
16. What are the geographic locations of this particular occupation?
17. What are the main advantages and disadvantages of this occupation?
18. Are fringe benefits provided for the employee by the employer in this occupation? If so, are they adequate and what are they?
19. In this employment is the employee assured of steady work or is it a seasonal or irregular occupation?
20. In this occupation, is the employee exposed to work hazards and occupational diseases? If so, what are the work hazards and occupational diseases?

21. Why do you as a future employee think that this occupation would not be suited for you?
22. What personal interest do you have that would help prepare you for this occupation?
23. What occupational requirements in this occupation, as an employee, would be hard for you to fulfill.
24. If you could be employed in this occupation as an employee today on the basis of your research what would your decision be?

XVI. Occupational Information Facts

Student's Name _____

Job Title _____

Other Titles Used _____ Male _____ Female _____

Summary or Function of the Occupation _____

Salary Scale: Minimum _____ Maximum _____

Bonus _____ Commission _____

Working Hours: Average per week _____ From _____ To _____

Number of nights _____ Shift work _____

Overtime _____ Never _____ Seldom _____ Frequent _____

Education: Elementary _____ Junior High _____

Senior _____ College _____

Post Secondary _____ Technical _____

Other _____

Job Experience: Previous Experience Required? Yes _____ No _____

Acceptable Type & Length _____

Previous Jobs Normally Held _____

Types of Promotions _____

Promotional Opportunities _____

Fringe Benefits: Hospitalization? Yes _____ No _____

Adequate Coverage? Yes _____ No _____

Paid Vacation? Yes _____ No _____

Sick Leave? Yes _____ No _____

Paid Holidays? Yes _____ No _____

Life Insurance? Yes _____ No _____

Retirement Benefits? Yes _____ No _____

Educational Incentive Pay? Yes _____ No _____

Supervision: Supervision of other employees _____
Supervised by? _____
Self Directed? _____

Equipment: General(Name) _____
Special(Name) _____
Company Furnish? Yes _____ No _____
You Furnish Own? Yes _____ No _____
Company pay for your Equipment and Materials?
Yes _____ No _____

On The Job Training: Length of time? _____
Skills taught? _____
Transferable to another position?
Yes _____ No _____

Relationship to other occupations:
Within the organization? Yes _____ No _____
Outside the organization? Yes _____ No _____

Technical Knowledge: Seldom _____ Often _____ Frequent _____
Other Types of Knowledge needed to perform effectively with-
in this particular occupation: (Name) _____

Basic Skills needed in this occupation: (Name) _____

Can I function as a individual in this occupation: (Describe)

What worthwhile contributions can I make in this organization
as an individual? (Describe) _____

XVII. Personality Profile

Each individual knows himself better than any one else. In order to obtain a personality profile of yourself and to understand yourself better as to your own strengths and weaknesses be completely fair as you check each question. Then after you have completed the checklist study it to see where and what you can do as an individual to improve yourself as you prepare for some type of gainful employment.

	Never	Seldom	Usually	Sometimes	Always
1. Cheerful	_____	_____	_____	_____	_____
2. Sad	_____	_____	_____	_____	_____
3. Friendly	_____	_____	_____	_____	_____
4. Pleasant	_____	_____	_____	_____	_____
5. Sincere	_____	_____	_____	_____	_____
6. Persistent	_____	_____	_____	_____	_____
7. Alert	_____	_____	_____	_____	_____
8. Tactful	_____	_____	_____	_____	_____
9. Punctual	_____	_____	_____	_____	_____
10. Neat	_____	_____	_____	_____	_____
11. Cooperative	_____	_____	_____	_____	_____
12. Argumentative	_____	_____	_____	_____	_____
13. Courteous	_____	_____	_____	_____	_____
14. Honest	_____	_____	_____	_____	_____
15. Self-Controlled	_____	_____	_____	_____	_____
16. Thorough	_____	_____	_____	_____	_____
17. Sympathetic	_____	_____	_____	_____	_____
18. Reliable	_____	_____	_____	_____	_____

	Never	Seldom	Usually	Sometimes	Always
19. Loyal	_____	_____	_____	_____	_____
20. Helpful	_____	_____	_____	_____	_____
21. Confident	_____	_____	_____	_____	_____
22. Ambitious	_____	_____	_____	_____	_____
23. Lazy	_____	_____	_____	_____	_____
24. Trustworthy	_____	_____	_____	_____	_____
25. Modest	_____	_____	_____	_____	_____
26. Loud	_____	_____	_____	_____	_____
27. Foul Mouth	_____	_____	_____	_____	_____
28. Patient	_____	_____	_____	_____	_____
29. Dirty	_____	_____	_____	_____	_____
30. Accurate	_____	_____	_____	_____	_____

XVIII. Interview Techniques

Regardless of how proficient a person may be in a chosen profession or occupation, many times the outcome depends upon the job interview. Each person should know established rules of decorum and effective methods for establishing rewarding relationships with the employer for a beneficial reward.

1. Make your best appearance.
2. The first impression is a lasting one, so make yours a good one.
3. Keep in mind that the interview begins the second that you make your appearance before the employer.
4. Keep the interview moving.
5. Do not monopolize the conversation.
6. Be respectful with the person who is doing the interview, after all you may be his future employee.
7. Be alert, because the interview is a special kind of conversation in which the sole purpose is to exchange information which is vital to both parties.
8. The person who is prepared for the interview has the better chance of receiving employment.
9. When the interview has been adequately covered, summarize, and leave after thanking the person for granting you an interview.

Information which would be helpful to know during the job interview.

1. Learn about the specific occupation before you go for an interview.
2. Be able to give the interviewer a concise picture of yourself as to abilities and interests.
3. Select the highlights about yourself that you can emphasize during the interview.
4. End the interview with a positive atmosphere
5. Use correct grammar and do not damage the interview with slang or hip expressions.
6. Your behavior reveals inward things about you that you as a prospective employee can not put into words. So make sure that you use good manners and are courteous at all times.

XIX. Time Element

The organization of the curriculum in grades seven and eight will be characterized by the studying of occupational clusters across a broad spectrum of vocational interest. Two hours per week in the seventh grade and three hours per week in the eighth grade will be used in studying selected occupational themes and/or clusters which will be correlated and/or inter-linked to the present curriculum.

XX. Resource Bibliography for Levels Seven and Eight

BOOKS

Thiemann, Norma. Handbook Of Job Facts. Science Research Associates.

Baker, Sam Sinclair. The Indoor And Outdoor Grow It Book. Random House, 1966.

Billington, Elizabeth T. Understanding Ecology. Frederick Warne and Company, Inc., New York, 1971.

Brown, Louise Bush. Young America's Garden Book. Charles Scribner's Sons, New York, 1962.

Buehr, Walter. Timber! Farming Our Forest. William Morrow & Company, New York, 1960.

Carson, Rachel. The Edge Of The Sea. Houghton Mifflin Company, Boston, 1955.

Darling, Lois and Louis. A Place In The Sun: Ecology And The Living World. William Morrow and Company, New York, 1968.

DeWaard, E. John. The Shape Of Living Things. Doubleday & Company, Garden City, New York, 1969.

Heady, Eleanor B. Coat Of The Earth: The Story Of Grass. W.W. Norton and Company, New York, 1968.

Hellman, Hal. The Right Size. G. P. Putnam's and Sons, New York, 1968.

Hillcourt, William. The New Field Book Of Nature Activities And Hobbies. G. P. Putnam's and Sons, New York, 1970.

Kane, Henry B. Four Seasons In The Woods. Alfred A. Knopf, New York, 1968.

Laycock, George. America's Endangered Wildlife. Grosset & Dunlap, Inc. New York, 1969.

Morgan, Ann Haven. Field Book Of Ponds And Streams. G. P. Putnam's and Sons, New York, 21st Edition, 1930.

Nickelsburg, Janet. Ecology, Habitats, Niches, And Food Chains. J. B. Lippincott Company, New York, 1969.

Raskin, Edith. The Pyramid Of Living Things. McGraw Hill, New York, 1971.

Rees, Etta Schenider. The Community Of Living Things In Fresh And Salt Water. Creative Educational Society, Inc., Mankato, Minnesota, 1967.

Rees, Etta Schenider. The Community Of Living Things In Parks And Gardens. Creative Educational Society, Inc., Mankato, Minnesota, 1967.

Stephen, David and James Lockie. Nature's Way. McGraw & Hill, New York, 1969.

Walker, John R. Modern Metal Working. Goodheart & Willcox Co. South Holland, Illinois, 1970.

Van Dersal, William R. The Land Renewed. Walck, Incorporated, New York, 1968.

KITS:

Occupational Exploration Kit. Science Research Associates.

Careers For High School Graduates. Sra., 11 Leaflets. 1 Book (What To Do After High School)

Careers For Women. Sra., 5 Booklets.

Job Experience. Sra., 17 Envelopes, 11 Boxes.

Job Preparation A.D./ Job Application. Self-Development.

Job Preparation A.D./ On The Job. Self-Development.

Job Preparation A.D./ Preparation For Interviews. Self-Development.

DISK RECORDINGS:

How To Study And Why. NSPRA, 2 12 Records, 33 1/3 RPM, GR. 7-12.

Teaching Children Values Through Unfinished Stories. Educational Activities, 1 12" Record, 33 1/3 RPM.

SOUND FILMSTRIPS: (Cassettes)

The A. B. C.'s Of Getting And Keeping A Job. Eyegate, 1970, 8 Color Filmstrips, 4 Cassettes, Gr. 7-12.

The ABC's of Getting and Keeping a Job	Labor Unions On the Job
Applying for the Job You Want	Preparing for the Job You Want
Budgeting Your Money	Quizstrip
Health Rules to Follow	

America's Labor Force. Eyegate, 1971, 6 Color Filmstrips, 6 Cassettes, Gr. 7-12.

Airline Pilots Association	International Ladies
American Federation of Musicians	Garment Workers Union
International Brotherhood of Electrical Workers	United Automobile Workers
	United Federation of Teachers

Ancient Crafts-Modern Times. Eyegate, 1971, 6 Color Filmstrips, 6 Cassettes, Gr. 5-12.

The Cabinetmaker-Sculpture in Wood	The Potter-Beauty in Clay
The Glassmaker-Transparent Creations	The Silversmith-Metallic Art
The Graphics Designer-Art in Print	The Textile Designer-Woven Art

Business Filing. Coronet, n. d., 6 Color Filmstrips, 6 Cassettes, Gr. 7-12.

Alphabetic Correspondence	Data Processing and Microfilming
Alphabetizing Rules	Other Filing Systems
Charge and Transfer Methods	Types of Equipment

Careers In Aerospace. Eyegate. 1970, 12 Color Filmstrips, 6 Cassettes, Gr. 7-12.

Aerospace Sales	Flight Engineer
Aircraft Maintenance and Food Service	Jet Captain
Aircraft Maintenance Mechanic	Jet Engine Mechanics
Air Freight Agent	Passenger Service Representative
Airline Ticket Agent	Skycap and Baggage Handler
Control Tower Operator	Stewardess

Jobs In Health Service. Coronet, n. d., 8 Color Filmstrips,
8 Cassettes, Gr. 7-12.

Dental Assistant	Nurse's Aide
Dental Laboratory Technician	Optical Technician
Medical Laboratory Assistant	Optometric Assistant
Medical Photographer	Radiology Technician

Occupational Education. Eyegate, 1970, 9 Color Filmstrips,
5 Cassettes, Gr. 7-12.

Fixing a Flat Tire	The School Cafeteria
The Gas Station Attendant	Worker
How to Use Your Checkbook	Stocker in a Supermarket
The Job Interview	The Waitress
The Nurse's Aide	The Variety Store

Shop Safety. Coronet, n. d., 6 Color Filmstrips,
6 Cassettes, Gr. 7-12.

Drill Presses and Lathes	Hand Saws, Chisels and Files
General Shop Hazards	Screwdrivers, Wrenches, Sheet
Grinders, Routers, Power	Metal and Welding
Saws	Think Safety

The World of Work: Vocational Opportunities. Eyegate,
1970, 14 Color Filmstrips, 7 Cassettes, Gr. 7-12 .

Automobile Mechanic	Receptionist
Automotive Sales	Sheet Metal Worker-Building
Representative	Trades
Cook	Sheet Metal Worker
Data Processing Clerk	Tool and Die Maker
Electrician	TV and Radio Repair
Medical Assistant	What is Your Future
Printer	in the Changing World
Real Estate Sales	of Work

Cassettes

American Occupations Series, Jonesboro, Ark; Educational Sensory Programming, 99 Tapes, (2 lessons on each tape, each lesson 15 minutes) n. d.

Titles are:

1. "Tomorrow's Jobs-Part I"
"Tomorrow's Jobs-Part II"
2. "Accountant"
"Advertising Workers"
3. "Marketing Research Workers"
"Personnel Workers"
4. "Public Relations Workers"
"Protestant Clergymen"
5. "Rabbis"
"Roman Catholic Priests"
6. "Foresters"
"Forestry Aides"
7. "Range Managers"
"Employment Counselors"
8. "Rehabilitation Counselors"
"School Counselors"
9. "Engineering"
"Types of Engineering"
10. "Physicians"
"Osteopathic Physicians"
11. "Dentists"
"Dental Hygienists"
12. "Dental Assistant"
"Dental Lab. Technician"
13. "Registered Nurses"
"Licensed Practical Nurses"
14. "Optometrists"
"Pharmacists"
15. "Podiatrists"
"Chiropractors"

16. "Occupational Therapist"
"Physical Therapist"
17. "Speech Pathologist and Audiologist"
"Medical Laboratory Worker"
18. "Radiologic Technologists"
"Medical Record Librarian"
19. "Dieticians"
"Hospital Administrator"
20. "Sanitarians"
"Veterinarians"
21. "Mathmeticians"
"Statisticians"
22. "Geologist"
"Geophysicists"
23. "Meterologists"
"Oceanographers"
24. "Life Scientists"
"Biochemists"
25. "Chemists"
"Physicists"
26. "Astronomers"
"Actor-Actress"
27. "Dancers"
"Musicians and Music Teachers"
28. "Singers and Singing Teachers"
"Commercial Artists"
29. "Industrial Designer"
"Interior Decorator"
30. "Anthropologists"
"Economists"
31. "Geographers"
"Historians"
32. "Political Scientists"
"Sociologists"
33. "Kindergarten and Elementary School Teacher"
"Secondary School Teacher"

34. "College and University Teachers"
"Engineering Science"
35. "Draftsman"
"Newspaper Reporter"
36. "Technical Writers"
"Architects"
37. "College Placement Officer"
"Home Economists"
38. "Landscape Architects"
"Lawyers"
39. "Librarians"
"Library Technicians"
40. "Models"
"Photographers"
41. "Systems Analysts"
"Programmers"
42. "Psychologists"
"Recreation Worker"
43. "Social Workers"
"Surveyors"
44. "Urban Planners"
"Managerial Occupations"
45. "Industrial Traffic Manager"
"Purchasing Agent"
46. "Clerical Occupations"
"Bookkeeping Workers"
47. "Cashiers"
"Electronic Computer Operators"
48. "Office Machine Operator"
"Shipping-Receiving Clerk"
49. "Stenographer-Secretary"
"Typists"
50. "Telephone Operator"
"Auto Parts Counter Man"
51. "Auto Salesman"
"Auto Service Advisor"

52. "Insurance Agent-Broker"
"Manufacturer's Salesman"
53. "Real Estate Salesmen-Broker"
"Retail Trade Salesworker"
54. "Securities Salesman"
"Wholesale Trade Workers"
55. "Barbers"
"Cosmetologists"
56. "Cooks-Chefs"
"Waiters-Waitresses"
57. "FBI Special Agents"
"Police Officers"
58. "State Police Officers"
"Fire Fighters"
59. "Hospital Attendants"
"Building Custodians"
60. "Bricklayer"
"Carpenter"
61. "Cement Mason"
"Construction Laborer"
62. "Electricians"
"Elevator Construction"
63. "Floor Covering Installers"
"Glaziers"
64. "Lathers"
"Marble Setters"
65. "Operating Engineers"
"Painters and Paperhangers"
66. "Plasters"
"Plumbers and Pipefitters"
67. "Roofers"
"Sheet Metal Workers"
68. "Stonemasons"
"Structural Steel Workers"
69. "Truckdriver"
"Local Truckdriver"

70. "Routemen"
"Intercity Busdriver"
71. "Local Busdriver"
"Taxi Drivers"
72. "Machinists"
"Machine Tool Operator"
73. "Tool and Die Maker"
"Instrument Maker"
74. "Air Conditioning Mechanic"
"Appliance Servicemen"
75. "Auto Body Repairmen"
"Auto Mechanics"
76. "Business Machine Servicemen-Part I"
"Business Machine Servicemen-Part II"
77. "Diesel Mechanics"
"Electric Sign Servicemen"
78. "Farm Equipment Mechanic"
"Industrial Machinery Repairmen"
79. "Instrument Repairman"
"Maintenance Electrician"
80. "Millwrights"
"Radio-T.V. Technician"
81. "Truck and Bus Mechanic"
"Vending Machine Mechanic"
82. "Watch Repairman"
"Composing Room Occupation"
83. "Photoengravers"
"Electro-Stereotypers"
84. "Printing Pressmen"
"Lithographics"
85. "Motion Picture Projectionist"
"Photographic Laboratory Occupation"
86. "Petroleum Occupations-Part I"
"Petroleum Occupations-Part II"
87. "Pilots-Co-Pilot Part I"
"Pilots-Co-Pilot Part II"

88. "Flight Engineers"
"Stewardess"
89. "Aircraft Mechanics"
"Airplane Dispatcher"
90. "Air Traffic Controller"
"Ground Radio Operator"
91. "Radio-T.V. Announcer"
"Broadcast Technician"
92. "Locomotive Engineer"
"Conductor"
93. "Brakeman"
"Telegrapher"
94. "Telephone Craftsman"
"Telephone Equipment Installer"
95. "Lineman-Cable Splicer"
"Telephone Repair-Installer"
96. "Bank Clerk"
"Teller"
97. "Hotel Clerk"
"Hotel Manager"
98. "Federal Civilian Government Worker-Part I"
"Federal Civilian Government Worker-Part II"
99. "Mail Carriers"
"Postal Clerks"

FILMS 16 MM.

Applying For A Job. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 13 Min., Gr. 7-12.

Choosing A Job. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 12 Min., Gr. 7-12.

Communicating With The Public. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 12 Min., Gr. 7-12.

Development of Communication. Encyclopedia Britannica Educational Corp., n. d. Black/White, Sound, 10 Min., Gr. 7-12.

Development of Transportation. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 11 Min., Gr. 7-12.

The Doctor. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 17 Min., Gr. 7-9.

Don't Get Angry. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 12 Min., Gr. 4-9.

Getting A Promotion. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 14 Min., Gr. 7-12.

Getting The News. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 18 Min., Gr. 7-9.

Health In Our Community. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 14 Min., Gr. 7-9.

The Industrial Revolution. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 23 Min., Gr. 7-12.

The Industrial Worker. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 17 Min., Gr. 7-9.

The Miner. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 15 Min., Gr. 7-9.

Planning Your Career. Encyclopedia Britannica Educational Corp., n. d. Black/White, Sound, 16 Min., Gr. 7-12.

The Rise of Big Business. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 27 Min., Gr. 7-12.

The Rise of Labor. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 30 Min., Gr. 7-12.

Working Together. Encyclopedia Britannica Educational Corp., n. d. Color, Sound, 12 Min., Gr. 7-12.

You Can Go A Long Way. Encyclopedia Britannica Educational Corp., n. d. Black/White, Sound, 22 Min., Gr. 7-9.

Filmstrips:

An Age Of Change. McGraw, 40 Frames, Color, Gr. 7-9.

At Home And In The Public. McGraw, 40 Frames, Color
Gr. 7-12.

At School. McGraw, 40 Frames, Color, Gr. 7-12.

Dating. McGraw, 40 Frames, Color, Gr. 7-9.

Dining Out. McGraw, 42 Frames, Color, Gr. 7-12.

Do You Like Flowers? Eyegate, 42 Frames, Color, Gr. 7-12.

Do You Like Sports? Eyegate, 42 Frames, Color, Gr. 7-12.

Do You Love Animals? Eyegate, 42 Frames, Color, Gr. 7-12.

Enjoying Today. Encyclopedia Britannica, 50 Frames,
Color, Gr. 7-12.

Future In Hand. McGraw, 40 Frames, Black and White,
Gr. 7-12.

Family Portrait. McGraw, 42 Frames, Black and White,
Gr. 7-12.

How About Being A Key Punch Operator? Eyegate, 41 Frames,
Color, Gr. 7-12.

How About Being An Electronics Assembler? Eyegate, 40
Frames, Color, Gr. 7-12.

How About Office Work? Eyegate, 40 Frames, Color,
Gr. 7-12.

How To Take A Test. Society for Visual Education, 40 Frames,
Color, Gr. 6-12.

It Pays To Save. McGraw, 42 Frames, Color, Gr. 4-12.

It's A Date. McGraw, 40 Frames, Black and White,
Gr. 7-12.

Leaders And Followers. Encyclopedia Britannica, 50 Frames,
Color, Gr. 7-12.

Parties. McGraw, 40 Frames, Color, Gr. 7-12.

Preparing For Daily Work. McGraw. 40 Frames, Color,
Gr. 7-9.

Preparing For Test. McGraw, 42 Frames, Color, Gr. 7-9.

Preparing To Study. Society for Visual Education, Inc., 42 Frames, Color, Gr. 5-12.

Oldest In The Class-My Teacher. Troll, 40 Frames, Color, Gr. 6-9.

Seeing Double. McGraw, 42 Frames, Black and White, Gr. 7-12.

Short Arc Welding. Linde, 50 Frames, Color, Gr. 8-12.

Starting Junior High School. McGraw, 42 Frames, Color, Gr. 7-9.

Table Manners. McGraw, 40 Frames, Color, Gr. 7-12.

Want To Work In A Laundry? Eyegate, 42 Frames, Color, Gr. 7-12.

What Are Job Families? Society for Visual Education, Inc., 42 Frames, Color, Gr. 4-8.

What Do You Like To Do? Society for Visual Education, Inc., 42 Frames, Color, Gr. 1-9.

What Is a Job? Society for Visual Education, Inc., 42 Frames, Color, Gr. 6-9.

What Good Is School? Society for Visual Education, Inc., 42 Frames, Color, Gr. 1-9.

What Is A Family? Society for Visual Education, Inc., 40 Frames, Color, Gr. 1-9.

What Is Behavior? McGraw, 42 Frames, Color, Gr. 7-12.

What To Ask, How And Where To Find The Answer? Society for Visual Education, Inc., 42 Frames, Color, Gr. 7-12.

Who Are You? Society for Visual Education Inc., 40 Frames, Color, Gr. 1-9.

Why Study? Society for Visual Education, Inc., 42 Frames, Color, Gr. 7-12.

With This Ring. McGraw, 40 Frames, Black and White, Gr. 7-12.

Would You Like Hospital Work? Eyegate, 42 Frames, Color, Gr. 7-12.

Would You Like To Be A Cashier? Eyegate, 42 Frames, Color, Gr. 7-12.

Would You Like To Sell? Eyegate, 42 Frames, Color, Gr. 7-12.

You And Your Grooming. McGraw, 34 Frames, Color, Gr. 7-12.

Your Clothing. McGraw, 42 Frames, Color, Gr. 7-12.

Your Face. McGraw, 41 Frames, Color, Gr. 7-12.

Your Figure. McGraw, 40 Frames, Color, Gr. 7-12.

Your Hair. McGraw, 41 Frames, Color, Gr. 7-12.

Your Hands And Feet. McGraw, 40 Frames, Color, Gr. 7-12.

Your School Publications. Jam Handy, 6 Filmstrips, 42 Frames Each, Color, Gr. 7-12.

Filmstrips and Disk Recordings:

Advanced Study Habits, Attitudes and Skills. YLF
Materials Corporation, 6 Filmstrips, Color, 6 10"
Records, 33 1/3 RPM., Gr. 6-9.

Basic Study Habits, Attitudes, and Skills. YLF
Materials Corporation, 6 Filmstrips, Color, 6 10"
Records, 33 1/3 RPM., Gr. 4-7.

Children Face Social Realities. Eyegate, 2 Filmstrips,
Color, 1 10" Record, Gr. 4-7.

Choosing Your Career. Harcourt, 2 Filmstrips, Color,
2 12" Records, 33 1/3 RPM., Gr. 7-12.

Dating Topics For Older Teens. Society for Visual
Education, Inc., 4 Filmstrips, Color, 2 12" Records,
33 1/3 RPM., Gr. 7-12.

Developing Basic Values. Society for Visual Education,
Inc., 4 Filmstrips, Color, 3 12" Records, 33 1/3 RPM.,
Gr. 7-12.

Developing Your Study Skills. Harcourt, 2 Filmstrips,
Color, 2 12" Records, 33 1/3 RPM., Gr. 7-12.

Dropping Out: Road To Nowhere. Harcourt, 2 Filmstrips,
Color, 2 12" Records, 33 1/3 RPM., Gr. 8-12.

Failure: A Step Toward Growth. Harcourt, 2 Filmstrips,
Color, 2 12" Records, 33 1/3 RPM., Gr. 7-12.

Four Who Quit. Harcourt, 2 Filmstrips, Color, 2 12"
Records, 33 1/3 RPM., Gr. 8-12.

Going Places In The City. Coronet, 6 Filmstrips,
Color, 3 12" Records, 33 1/3 RPM., Gr. 4-8.

Growing Into Manhood: A Middle School Approach.
Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3
RPM., Gr. 8-12.

Growing Into Womanhood: A Middle School Approach.
Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3
RPM., Gr. 8-12.

High School Course Selection And Your Career. Harcourt,
2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 7-10.

Home Services. Society for Visual Education, Inc.,
2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 3-9.

How To Succeed In High School-By Trying. Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 7-9.

Hung Up On Homework? Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 7-12.

I Never Looked At It That Way Before. Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 7-12.

I Wish I'd Known That Before I Went To College. Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 7-12.

If You're Not Going To College. Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 7-12.

Love and Marriage. Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 8-12.

Older Teens and Family Relationships. Society for Visual Education, Inc., 4 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 8-12.

Popularity Problems Of Older Teens. Society for Visual Education, Inc., 4 Filmstrips, Color, 4 12" Records, 33 1/3 RPM., Gr. 8-12.

Popularity Problems Of Young Teens. Society for Visual Education, Inc., 4 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 6-9.

Role Of The Counselor In The Secondary School. Harcourt, 1 Filmstrip, Color, 1 12" Record, 33 1/3 RPM., Gr. 7-12.

Should You Go To College? Harcourt, 1 Filmstrip, Color, 1 12" Record, 33 1/3 RPM., Gr. 8-12.

Social Problems. Society for Visual Education, Inc., 4 Filmstrips, Color, 1 12" Record, 33 1/3 RPM., Gr. 7-12.

Somebody's Cheating. Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 7-12.

Studying For Success. Eyegate, 11 Filmstrips, Color, 5 12" Records, 33 1/3 RPM., Gr. 7-12.

The ABC's Of Getting and Keeping A Job. Eyegate, 4 Filmstrips, Color, 4 Cassettes, Gr. 7-12.

The Tuned Out Generation. Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 8-12.

Think Of Others First. Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 8-12.

Values For Teenagers. Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 7-12.

You And The Law. Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 7-12.

Your First Year In High School. Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 7-12.

You're More Than A Score. Harcourt, 2 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 7-12.

Young Teenagers And Family Relationships. Society For Visual Education, Inc., 4 Filmstrips, Color, 2 12" Records, 33 1/3 RPM., Gr. 7-12.

Tape Recordings of Occupations:

- Accountant. Imperial, 1 Cassette, Gr. 7-12.
- Accountant, Advertising Workers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.
- Advertising. Classroom, 1 Cassette, Gr. 7-12.
- Advertising. Imperial, 1 Cassette, Gr. 7-12.
- Agriculture. Classroom, 1 Cassette, Gr. 7-12.
- Air Conditioning and Refrigeration. Classroom, 1 Cassette, Gr. 7-12.
- Air Conditioning Mechanic: Appliance Servicemen. Educational Sensory Programming, 1 Cassette, Gr. 7-12.
- Air Traffic Controller: Ground Radio Operator. Educational Sensory Programming, 1 Cassette, Gr. 7-12.
- Aircraft Mechanics: Airplane Dispatcher. Educational Sensory Programming, 1 Cassette, Gr. 7-12.
- Anthropologists: Economists. Educational Sensory Programming, 1 Cassette, Gr. 7-12.
- Appliance Serviceman. Imperial, 1 Cassette, Gr. 7-12.
- Architect. Imperial, 1 Cassette, Gr. 7-12.
- Architecture. Classroom, 1 Cassette, Gr. 7-12.
- Artistic Interest Occupations. Wilson, 1 Reel, 3 3/4 IPS., Gr. 7-12.
- Assembler. Imperial, 1 Cassette, Gr. 7-12.
- Astronomers: Actor-Actress. Educational Sensory Programming, 1 Cassette, Gr. 7-12.
- Auto Body Repairman: Auto Mechanics. Educational Sensory Programming, 1 Cassette, Gr. 7-12.
- Auto Mechanic. Imperial, 1 Cassette, Gr. 7-12.
- Auto Salesman: Auto Service Advisor. Educational Sensory Programming, 1 Cassette, Gr. 7-12.
- Bank Clerk: Teller. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Barbers: Cosmetologists. Educational Sensory Programming,
1 Cassette, Gr. 7-12.

Beauty Culture. Classroom, 1 Cassette, Gr. 7-12.

Biologist. Imperial, 1 Cassette, Gr. 7-12.

Brakeman: Telegrapher. Educational Sensory Programming,
1 Cassette, Gr. 7-12.

Bricklayer: Carpenter. Educational Sensory Programming,
1 Cassette, Gr. 7-12.

Broadcasting. Classroom, 1 Cassette, Gr. 7-12.

Business Machine Servicemen, Part I: Business Machine
Servicemen Part II. Educational Sensory Programming,
1 Cassette, Gr. 7-12.

Business: How It Works. Wollensak, 1 Cassette, Gr. 7-12.

Careers In Science. University of Colorado, 1 Reel,
3 3/4 IPS., Gr. 7-12.

Carpenter. Imperial, 1 Cassette, Gr. 7-12.

Cashiers: Electronic Computer Operators. Educational
Sensory Programming, 1 Cassette, Gr. 7-12.

Cement Mason: Construction Laborer. Educational Sensory
Programming, 1 Cassette, Gr. 7-12.

Chemist. Imperial, 1 Cassette, Gr. 7-12.

Chemists: Physicists. Educational Sensory Programming,
1 Cassette, Gr. 7-12.

Chief Engineer. Imperial, 1 Cassette, Gr. 7-12.

Clerical Interest Occupations. Wilson, 1 Reel, 3 3/4
IPS., Gr. 7-12.

Clerical Occupations: Bookkeeping Workers. Educational
Sensory Programming, 1 Cassette, Gr. 7-12.

College and University Teachers: Engineering Science.
Educational Sensory Programming, 1 Cassette, Gr. 7-12.

College Placement Officer: Home Economists. Educational
Sensory Programming, 1 Cassette, Gr. 7-12.

Commerical Artist. Imperial, 1 Cassette, Gr. 7-12.

Commerical Photographer. Imperial, 1 Cassette, Gr. 7-12.

Computational Interest Occupational. Wilson, 1 Reel,
3 3/4 IPS., Gr. 7-12.

Computers. Classroom, 1 Cassette, Gr. 7-12.

Cook-Chief: Waiters-Waitresses. Educational Sensory
Programming, 1 Cassette, Gr. 7-12.

Cosmetologist. Imperial, 1 Cassette, Gr. 7-12.

Counselor. Imperial, 1 Cassette, Gr. 7-12.

Dancers: Musicians and Music Teachers. Educational
Sensory Programming, 1 Cassette, Gr. 7-12.

Dental Assistant: Dental Laboratory Technician. Educational
Sensory Programming, 1 Cassette, Gr. 7-12.

Dental Hygienist. Imperial, 1 Cassette, Gr. 7-12.

Dental Technician. Imperial, 1 Cassette, Gr. 7-12.

Diesel Mechanics: Electric Sign Servicemen. Educational
Sensory Programming, 1 Cassette, Gr. 7-12.

Dieticians: Hospital Administrator. Educational Sensory
Programming, 1 Cassette, Gr. 7-12.

Draftsman. Imperial, 1 Cassette, Gr. 7-12.

Draftsman: Newspaper Reporter. Educational Sensory
Programming, 1 Cassette, Gr. 7-12.

Education. Classroom, 1 Cassette, Gr. 7-12.

Electrician. Imperial, 1 Cassette, Gr. 7-12.

Electrician: Elevator Construction. Educational Sensory
Programming, 1 Cassette, Gr. 7-12.

Electronic Technician. Imperial, 1 Cassette, Gr. 7-12.

Elementary Teacher. Imperial, 1 Cassette, Gr. 7-12.

Engineering. Classroom, 1 Cassette, Gr. 7-12.

Engineering: Types of Engineering. Educational Sensory
Programming, 1 Cassette, Gr. 7-12.

Exploring The World Of Work. Wilson, 6 Cassettes, Gr. 7-12.

Farm Equipment Mechanic: Industrial Machinery Repairman.
Educational Sensory Programming, 1 Cassette, Gr. 7-12.

FBI Special Agents: Police Officers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Federal Civil Government Worker, Part I: Federal Civil Government Worker, Part II. Educational Sensory Programming, 1 Cassette, Gr. 7-12

The Fireman And His Work. Wollensak, 1 Reel, 3 3/4 IPS., Gr. 7-12.

Fireman-Water Tender. Imperial, 1 Reel, 3 3/4 IPS., Gr. 7-12.

Flight Engineers: Stewardesses. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Floor Covering Installer: Glaziers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Food Production. Classroom, 1 Cassette, Gr. 7-12.

Foresters Forestry Aids. Educational, 1 Cassette, Gr. 7-12.

Geographer: Historian. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Geologist: Geophysicist. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Grocery Store Clerk. Imperial, 1 Cassette, Gr. 7-12.

Heavy Machine Operator. Imperial, 1 Cassette, Gr. 7-12.

Health Careers. Classroom, 1 Cassette, Gr. 7-12.

Hospital Attendants: Building Custodians. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Hotel Clerk: Hotel Manager. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Hotel-Motel. Classroom, 1 Cassette, Gr. 7-12.

How To Get A Job. Wollensak, 1 Cassette, Gr. 7-12.

Industrial Designer: Interior Decorator. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Industrial Traffic Manager: Purchasing Agent. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Instrument Repairman: Maintenance Electrician. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Insurance Agent-Broker: Manufacturer's Salesman. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Insurance Broker. Imperial, 1 Cassette, Gr. 7-12.

Introducing The World Of Work, Part I. Wilson, 1 Reel, 3 3/4 IPS., Gr. 7-12.

Johnny Visits The Farm. Classroom, 1 Cassette, Gr. 7-12.

Kindergarten-Elementary School Teacher: Secondary School Teacher. Classroom, 1 Cassette, Gr 7-12.

Landscape Architects: Lawyers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Lathers: Marble Setters. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Laundry Routeman. Imperial, 1 Cassette, Gr. 7-12.

Lawyer. Imperial, 1 Cassette, Gr. 7-12.

Law. Classroom, 1 Cassette, Gr. 7-12.

Let's Learn About Banking. Wollensak, 1 Cassette, Gr. 7-12.

Let's Meet The Doctor. Wollensak, 1 Reel, 3 3/4 IPS, Gr. 7-12.

Let's Meet The Nurse. Wollensak, 1 Reel, 3 3/4 IPS, Gr. 7-12.

Let's Meet The Teacher. Wollensak, 1 Reel, 3 3/4 IPS, Gr. 7-12.

Librarian Imperial, 1 Cassette, Gr. 7-12.

Librarians: Library Technicians. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Life Scientists: Biochemists. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Lineman-Cable Splicer: Telephone Repair-Installer. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Local Busdriver: Taxi Drivers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Local Truck Driver. Imperial, 1 Cassette, Gr. 7-12.

Locomotive Engineer: Conductor. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Machinist. Imperial, 1 Cassette, Gr. 7-12.

Machinist: Machine Tool Operator. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Mail Carriers: Postal Clerks. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Marketing Research Workers: Personnel Workers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Mathematicians: Statisticians. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Mechanical Interest Occupation. Wilson, 1 Reel, 3 3/4 IPS., Gr. 7-12.

Medical Technician. Imperial, 1 Cassette, Gr. 7-12.

Medical X-Ray Technician. Imperial, 1 Cassette, Gr. 7-12.

Meteorologists: Oceanographers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Millwrights: Radio-TV Technician. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Models: Photographers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Motion Picture Projectionist: Photographic Laboratory Occupation. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Musician. Imperial, 1 Cassette, Gr. 7-12.

My Father Works. Wollensak, 1 Cassette, Gr. 7-12.

Nurse, Practical. Imperial, 1 Cassette, Gr. 7-12.

Nurse, Registered. Imperial, 1 Cassette, Gr. 7-12.

Occupational Therapist: Physical Therapist. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Oceanography. Classroom, 1 Cassette, Gr. 7-12.

Office Machine Operator: Shipping-Receiving Clerk. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Operating Engineers: Painters and Paperhangers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Optometrists: Pharmacists. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Our Friend The Policeman. Classroom, 1 Cassette,
Gr. 7-12

Outdoor Interest Occupations. Wilson, 1 Reel,
3 3/4 IPS., Gr. 7-12.

Persuasive Interest Occupations. Wilson, 1 Reel
3 3/4 IPS., Gr. 7-12.

Petroleum Occupations, Part I: Petroleum Occupations,
Part II. Educational Sensory Programming, 1 Cassette,
Gr. 7-12.

Photo Engravers: Electro-Sterotypers. Educational Sensory
Programming, 1 Cassette, Gr. 7-12.

Photography, Classroom, 1 Cassette, Gr. 7-12.

Physician. Imperial, 1 Cassette, Gr. 7-12.

Physicians: Osteopathic Physicians. Educational Sensory
Programming, 1 Cassette, Gr. 7-12.

Pilot-Co-Pilot. Part I; Pilot-Co-Pilot, Part II.
Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Pilot-Co-Pilot. Imperial, 1 Cassette, Gr. 7-12.

Planning Beyond High School. Wilson, 6 Cassettes, Gr. 7-12.

Plasterers: Plumbers and Pipe Fitters. Educational
Sensory Programming, 1 Cassette, Gr. 7-12.

Plumber-Pipefitter. Imperial, 1 Cassette, Gr. 7-12.

Podiatrist: Chiropractor. Educational Sensory Programming,
1 Cassette, Gr. 7-12.

Policeman. Imperial, 1 Cassette, Gr. 7-12.

The Policeman and His Work. Wollensak, 1 Cassette,
Gr. 7-12.

Political Scientists: Sociologist. Educational Sensory
Programming, 1 Cassette, Gr. 7-12.

Printer. Imperial, 1 Cassette, Gr. 7-12.

Printing and Engraving. Classroom, 1 Cassette, Gr. 7-12.

Printing Pressmen: Lithographics. Educational Sensory
Programming, 1 Cassette, Gr. 7-12.

Profit: Business Goal. Wollensak, 1 Cassette, Gr. 7-12.

Programmer. Imperial, 1 Cassette, Gr. 7-12.

Psychologists: Recreation Workers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Public Relations. Imperial, 1 Cassette, Gr. 7-12.

Public Relations: Protestant Clergyman. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Radio Officer. Imperial, 1 Reel, 3 3/4 IPS., Gr. 7-12.

Radiologic Technologist: Medical Record Librarian. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Radio-TV-Announcer: Broadcast Technician. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Ranger Manager: Employment Counselor. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Real Estate Broker. Imperial, 1 Cassette, Gr. 7-12.

Real Estate Salesman-Broker: Retail Trade Salesworker. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Registered Nurse: Licensed Practical Nurse. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Rehabilitation Counselors: School Counselors. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Repair Service. Classroom, 1 Cassette, Gr. 7-12.

The Restaurant Business. Classroom, 1 Cassette, Gr. 7-12.

Retail Saleswoman. Imperial, 1 Cassette, Gr. 7-12.

Roofers: Sheet Metal Workers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Routemen: Intercity Busdrivers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Sanitary Workers: Veterinarians. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Scientific Interest Occupations. Wilson, 1 Reel, 3 3/4 IPS, Gr. 7-12.

Scientific Research. Classroom, 1 Cassette, Gr. 7-12.

Secondary Teacher. Imperial, 1 Cassette, Gr. 7-12.

Secretarial Careers. Classroom, 1 Cassette, Gr. 7-12.

Secretary. Imperial, 1 Cassette, Gr. 7-12.

Securities Salesman: Wholesale Trade Workers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Selling. Classroom, 1 Cassette, Gr. 7-12.

Ship's Captain. Imperial, 1 Reel, 3/4 IPS, Gr. 7-12.

Singers and Singing Teachers: Commercial Artists. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Social Service Interest Occupations. Wilson, 1 Reel, 3 3/4 IPS, Gr. 7-12.

Social Work. Classroom, 1 Cassette, Gr. 7-12.

Social Worker. Imperial, 1 Cassette, Gr. 7-12.

Social Workers: Surveyors. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Speech Pathologists and Audiologist: Medical Laboratory Workers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

State Police Officers: Firefighters. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Stationary Engineer. Imperial, 1 Cassette, Gr. 7-12.

Stenographer-Secretary Typist. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Stewardess. Imperial, 1 Cassette, Gr. 7-12.

Stonemason: Structural Steel Worker. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Switchboard Operator. Imperial, 1 Cassette, Gr. 7-12.

Systems Analysis: Programmers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Technical Writers. Imperial, 1 Cassette, Gr. 7-12.

Technical Writers: Architects. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Telephone Craftsman: Telephone Equipment Installers. Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Telephone Operator: Automobile Parts Counter Man.
Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Tomorrow's Jobs, Part I: Tomorrow's Jobs, Part II.
Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Tool and Die Maker: Instrument Maker. Educational
Sensory Programming, 1 Cassette, Gr. 7-12.

Tool and Die Maker. Imperial, 1 Cassette, Gr. 7-12.

Transportation. Classroom, 1 Cassette, Gr. 7-12.

Truck and Bus Mechanic: Vending Machine Mechanic.
Educational Sensory Programming, 1 Cassette, Gr. 7-12.

Truckdrivers: Local Truckdrivers. Educational Sensory
Programming, 1 Cassette, Gr. 7-12.

Television and Radio Serviceman. Imperial, 1 Cassette,
Gr. 7-12.

Urban Planners: Managerial Occupations. Educational
Sensory Programming, 1 Cassette, Gr. 7-12.

Watch Repairman: Composing Room Occupations, Educational
Sensory Programming, 1 Cassette, Gr. 7-12.

Women In The World of Work. Wilson, 1 Reel, 3 3/4 IPS,
Gr. 7-12.

These clusters are a guide for the classroom teacher which relates the possible occupations that can be studied in the classroom learning period. These clusters are subject to change. This information is by no means intended to dictate a precise minute-by-minute schedule of activities nor is it intended to cover all the occupations that are covered within any given cluster. The occupations listed consist of a random selection from a large number of occupations found in each of the occupational clusters.

XXI. Occupational Clusters

1. Office Occupations
2. Marketing and Distribution Occupations
3. Consumer and Homemaking Occupations
4. Marine Science Occupations
5. Transportation Occupations
6. Agri-business and Natural Resources Occupations
7. Construction Occupations
8. Manufacturing Occupations
9. Public Service Occupations
10. Health Occupations
11. Fine Arts and Humanities Occupations
12. Environmental Occupations
13. Communication and Media Occupations
14. Hospitality and Recreation Occupations
15. Personal Service Occupations

Criteria of Different Levels
Within a Given Occupation

Professional

1. Important Function
2. Independent
3. Varied Responsibility
4. Deals with policy making and interpretation
5. High level of education where relevant

Semi-Professional and Managerial

1. Some Independence
2. Varied Responsibility
3. Policy Interpretation
4. High level of education where relevant

Technical and Skilled

1. Some variation in responsibility
2. Some policy interpretation and decision making
3. Special training, apprenticeship and/or experience
4. Knowledgeable in a particular skill or area

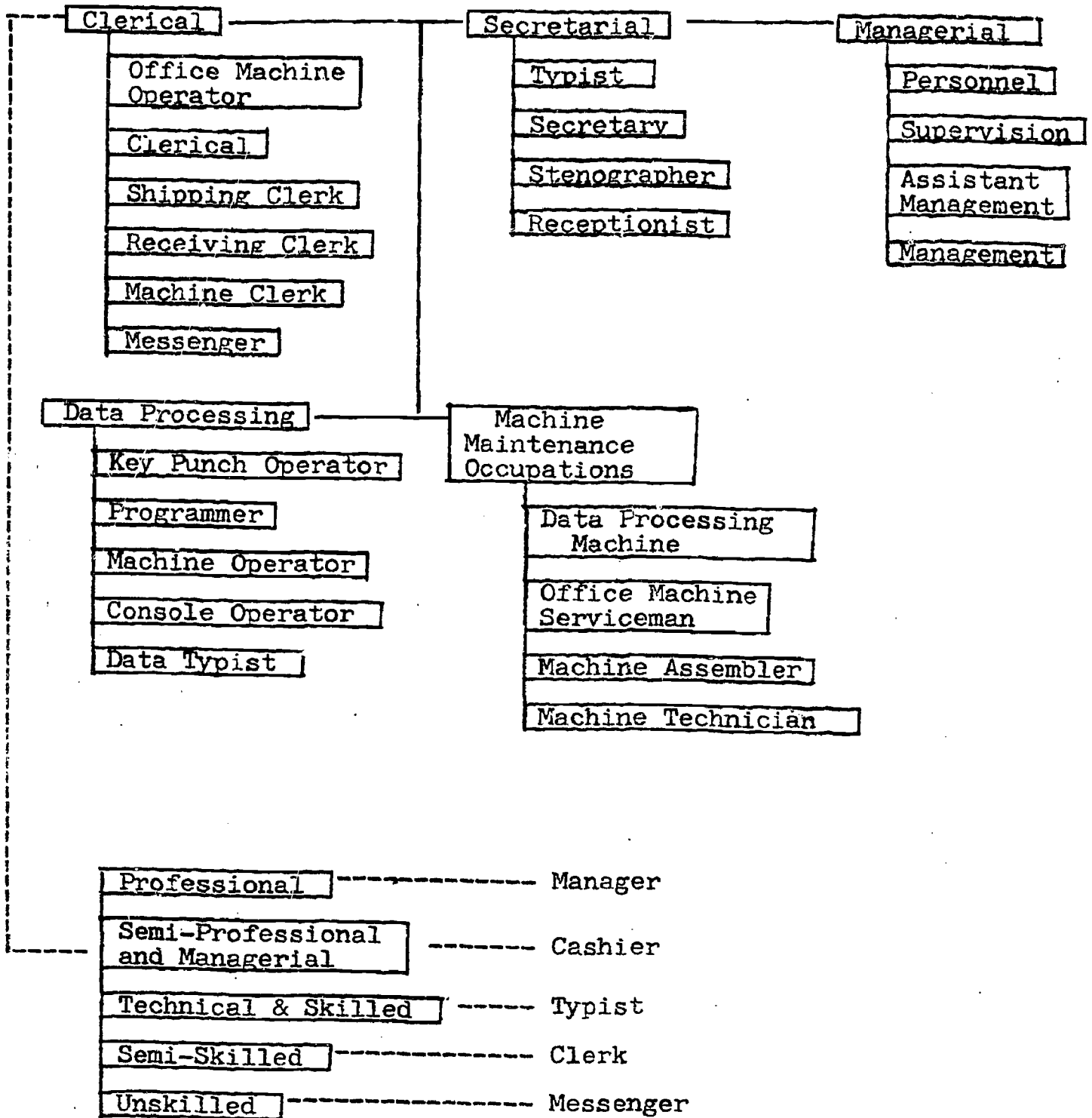
Semi-Skilled

1. Little or no responsibility
2. Some special training, apprenticeship and/or experience

Unskilled

1. No special training and/or skill

OFFICE OCCUPATIONAL CLUSTER



Simulated or Work Experience for
Office Occupational Cluster

Professional-----Manager: Practice sets in General Business or Office Administration. Can keep set of books for the store which would be set up in marketing and distribution.

Semi-Professional
and Managerial-----Cashier: Work with money that would go through the store or office of the school.

Technical and Skilled-----Typist: Type materials for the school or correspondence for the store. (General typing work)

Semi-Skilled-----File Clerk: Filing correspondence pertaining to school administration.

Unskilled-----Messenger: Taking messages to different personnel within the school building.

OFFICE OCCUPATIONS

Professional

Office Manager
Auditor
Certified Public Accountant
Statistician
Actuary

Semi-Professional and Managerial

Book Editor
Programmer
Account Executive
Accountant
Cashier

Technical and Skilled

Paymaster
Buyer
Secretary
Court Reporter
Bookkeeper
Stenographer
Data Processing Operator
Bank Clerk
Typist
Estimator
Legal Secretary
Medical Secretary
Copy Writers

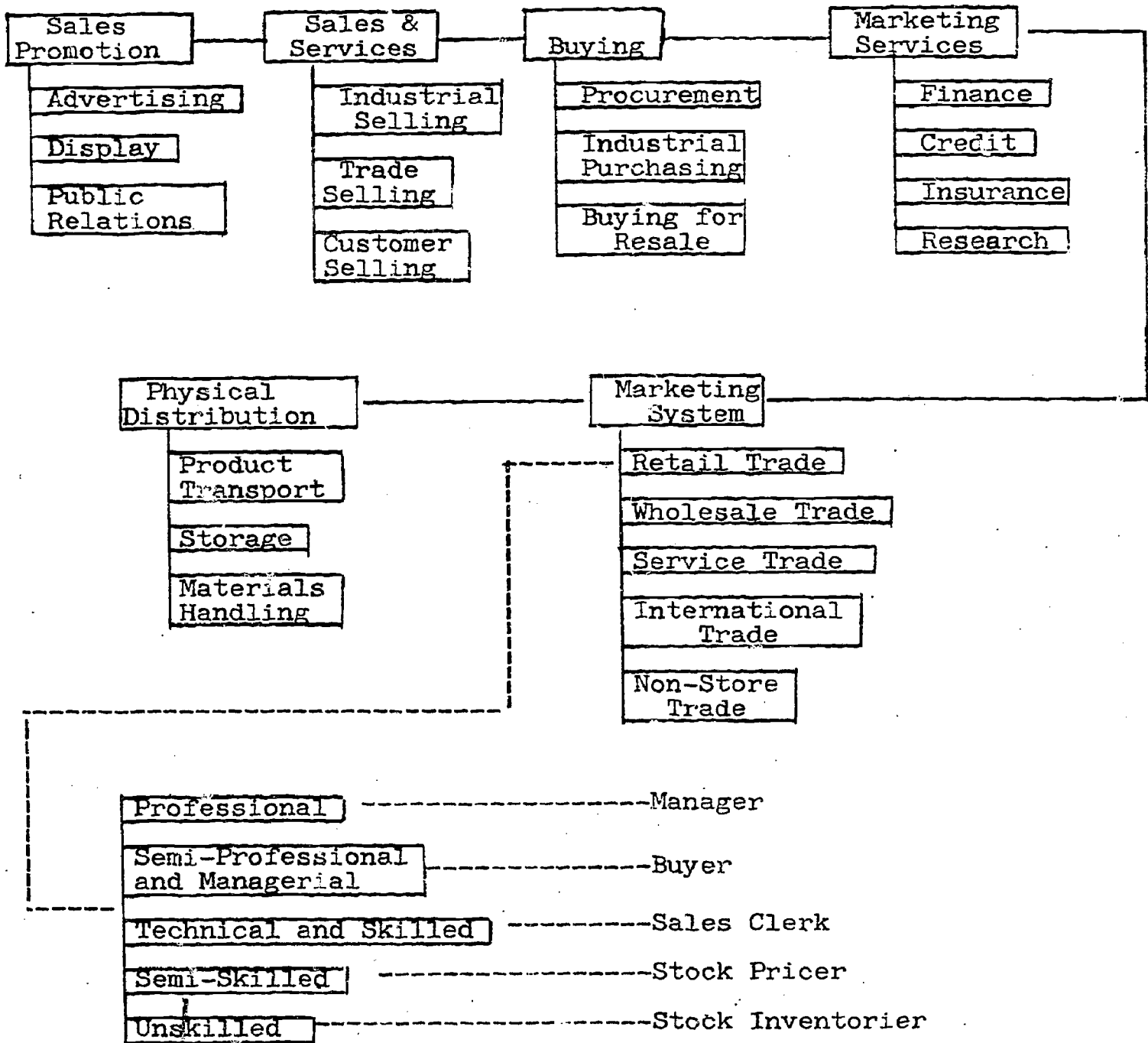
Semi-Skilled

Office Machine Operator
Teletype Operator
Library Technician
Tape Librarian
Hotel Clerk
Shipping Clerk
Switchboard Operator
Machine Operators

Unskilled

Sorter
Marker
Addresser
File Clerk
Credit Clerk
Messenger
Office Boy or Girl

MARKETING AND DISTRIBUTION OCCUPATIONAL CLUSTER



Simulated or Work Experience for Marketing
and Distribution Occupational Cluster

Professional-----	Manager:	Establish a cooperation which can be further developed into a school store.
Semi-Professional and Managerial-----	Buyer:	Buy items that can be later sold in the store that serves in school supplies for the student body.
Technical and Skilled-----	Displayer:	Displays merchandise so that it will attract attention and sell.
Semi-Skilled-----	Salesperson:	Works in the store selling different items.
Unskilled-----	Stock Personnel:	Takes care and inventory of all stock in the store.

MARKETING AND DISTRIBUTION OCCUPATIONS

Professional

Bank President
Planning Adminisitrator
Public Relations Worker

Semi-Professional and Managerial

Store Manager
Fashion Designer
Store Owner (Merchant)
Newspaper Reporter
Administration Manager
Advertising Account Executive
System Analysts
Buyers
Broker
Escrow Officer

Technical and Skilled

Department Manager
Auctioneer
Insurance Agent
Manufacturing Salesman
Radio-TV Time Salesman
Travel Agent
Real Estate Agent
Bank Teller
Adjuster
Model
Statistician
Technologist

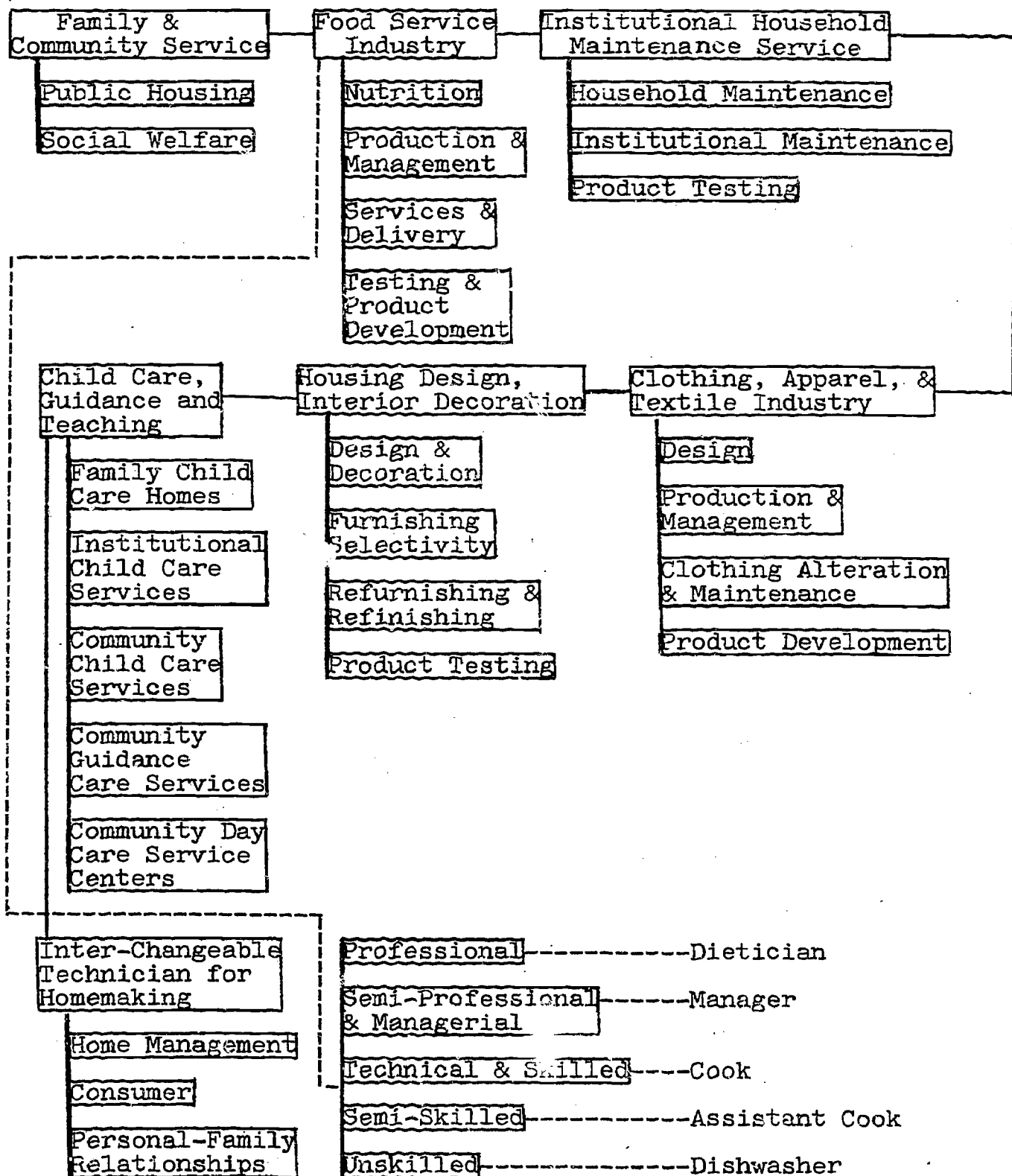
Semi-Skilled

Retail Salesman
Cashier
Checker
Interviewer
Clerks
Routemen
Stock Pricer

Unskilled

Stock Personnel
Guide
Comparison Shopper (Buyer)
Inventory (Stock)
Shipping Clerk
Delivery Boy
Packer

CONSUMER AND HOME MAKING
OCCUPATIONAL CLUSTER



Simulated or Work Experience for Consumer
and Homemaking Occupational Cluster

Professional-----	Manager:	Do planning and buying of supplies for the school lunch
Semi-Professional and Managerial-----	Dietician:	Plan balanced menus for the school hot lunch program.
Technical and Skilled-----	Cook:	Preparing school lunches.
Semi-Skilled-----	Assistant Cook:	Helping the cook in preparing the school lunches
Unskilled-----	Dishwasher:	Assist school lunch personnel in caring for the cafeteria.

CONSUMER HOME ECONOMICS OCCUPATIONS

Professional

Nutritionist
Dietician
County Home Economist
Research Economist

Semi-Professional and Managerial

Executive Housekeeper
Chef
Manager of Cafeteria
Food Products Tester
Home Service Representative
Food Inspector
Manager

Technical and Skilled

Baker
Tailor
Seamstress
Garment Examiner
Garment Inspector
Director of School Lunch Programs
Plant Hostess
Kitchen Supervisor
Home Lightning Demonstrator

Semi-Skilled

Cook
Clothing Maintenance Specialist
Caterer
Wardrobe Speciality Worker
Wardrobe Mistress
Cutter
Checker

Unskilled

Waiter
Waitress
Child Care Attendant
Nursemaid
Helper (cook's)
Housekeeper
Dishwasher

**MARINE SCIENCE
OCCUPATIONAL CLUSTER**

Commercial Fishing

Ocean Fishing

Seafood Processing

Seafood Inspection

Seaweed Harvesting
and Processing

Sport Fishing
Enterprises

Entrepreneurship

Marine Biology

Marine Ecology
Research

Marine Microbiological
Research

Marine Animal
Research

Marine Plant Research

Marine Biology
Laboratory Management

**Underwater Construction
and Salvage**

Underwater
Construction

Underwater Salvage
Demolition

Offshore Mineral
Production

Underwater Engineer
Research

Deepwater Diving
& Life Support

**Marine Exploration
(Oceanographic)**

Oceanographic
Mapping & Charting

Ocean Mineral
Exploration

Ocean Current &
Water Research

Aqua-Culture

Marine Fish
Research

Marine Plant
Research

Fish Hatching
& Raising

Professional

-----Ship Designer

**Semi-Professional
& Managerial**

-----Ship Builder

Technical & Skilled

-----Ship Fitter

Semi-Skilled

-----Calkers

Unskilled

-----Marina Attendant

Simulated or Work Experience For Marine
Science Occupational Cluster

Professional-----Ship Designer: Work on models with emphasis on sketches, specifications, scale drawings, and full-sized drawings of the entire ship.

Semi-Professional and
Managerial-----Ship Builder: Do various occupations concerning building models; such as painting or various other types of skilled work.

Technical and Skilled-----Ship Fitter: Fitting pieces of the model together, as indicated on the blueprint.

Semi-Skilled-----Calkers: Tighten seams and join to make them watertight and airtight of the model.

Unskilled-----Marina Worker: Tending and taking care of the models which have been built by other students.

MARINE SCIENCE OCCUPATIONS

Professional

Oceanographer
Ship Designer
Engineer

Ecologist (Marine)
Zoologicalist (Marine)
Microbiologicalist (Marine)
Botonist (Marine)

Semi-Professional and Managerial

Junior Engineer
Ship Builder
Laboratory Manager

Technical and Skilled

Diver
Machinist Foreman
Ship Fitter
Instrument Maker
Mechanic
Marine Plant Grower
Fish Hatcher & Raiser

Laboratory Technician
Dredger (Off Shore)
Driller (Off Shore)
Life Guard
Ocean Fisherman

Semi-Skilled

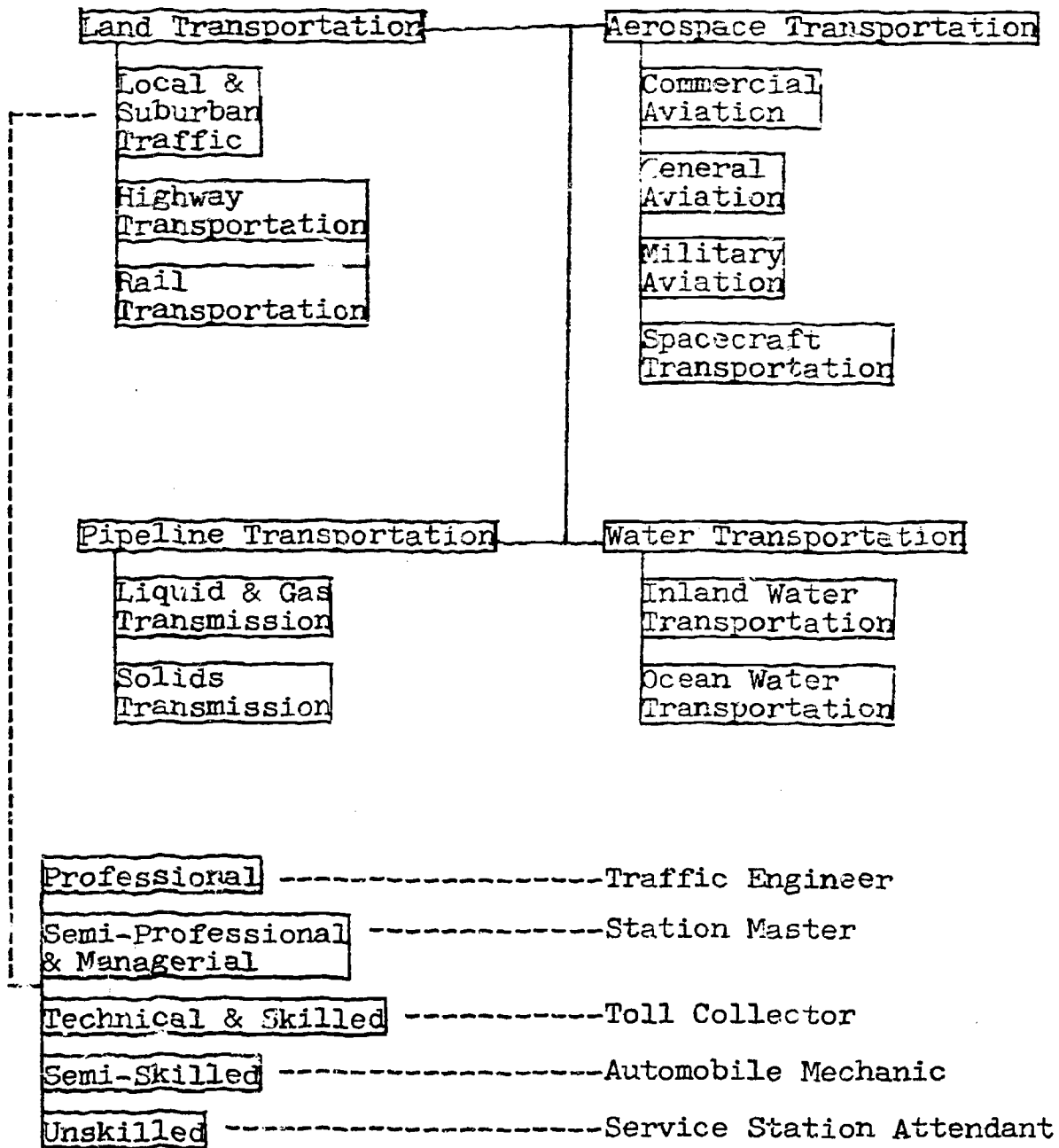
Fisherman
Ship Builder
Apprentice Machinist
Motor Boat Mechanic
Gear Man
Calker

Seafood Processer
Seafood Packer

Unskilled

Marina Attendant
Motorboat Mechanic Helper
Machinist Helper
Lookout

**TRANSPORTATION
OCCUPATIONAL CLUSTER**



Simulated or Work Experience for Transportation
Occupational Cluster

Professional-----Traffic Engineer:	Plan, design and develop traffic-control systems to prevent accidents, minimize congestion in the school, school activities and parking facilities of the school.
Semi-Professional and Managerial-----Station Master:	Plan, design and develop parking area for school personnel.
Technical and Skilled-----Toll Collector:	Responsibility for selling tickets for parking vehicle at school.
Semi-Skilled-----Automobile Mechanic:	Check school buses for such things as oil, etc.
Unskilled-----Service Station Attendant:	Check faculty cars in such areas as oil, water, tires, clean windshields and etc.

TRANSPORTATION OCCUPATIONS

Professional

Aerospace Engineer
Airline Pilot
Airport Manager
Flight Engineer
Traffic Engineer
Ship Captain

Semi-Professional and Managerial

Helicopter Pilot
Air Traffic Control
Chief Mate
Station Master

Technical and Skilled

Aerospace Technicians
Airline Dispatchers
Airline Stewardesses/Stewards
Traffic Agent
Air Mechanic
Brakeman
Driving Instructor
Long Distance Truck Drivers
Ship Pilots
Dispatchers
Ticket Agent

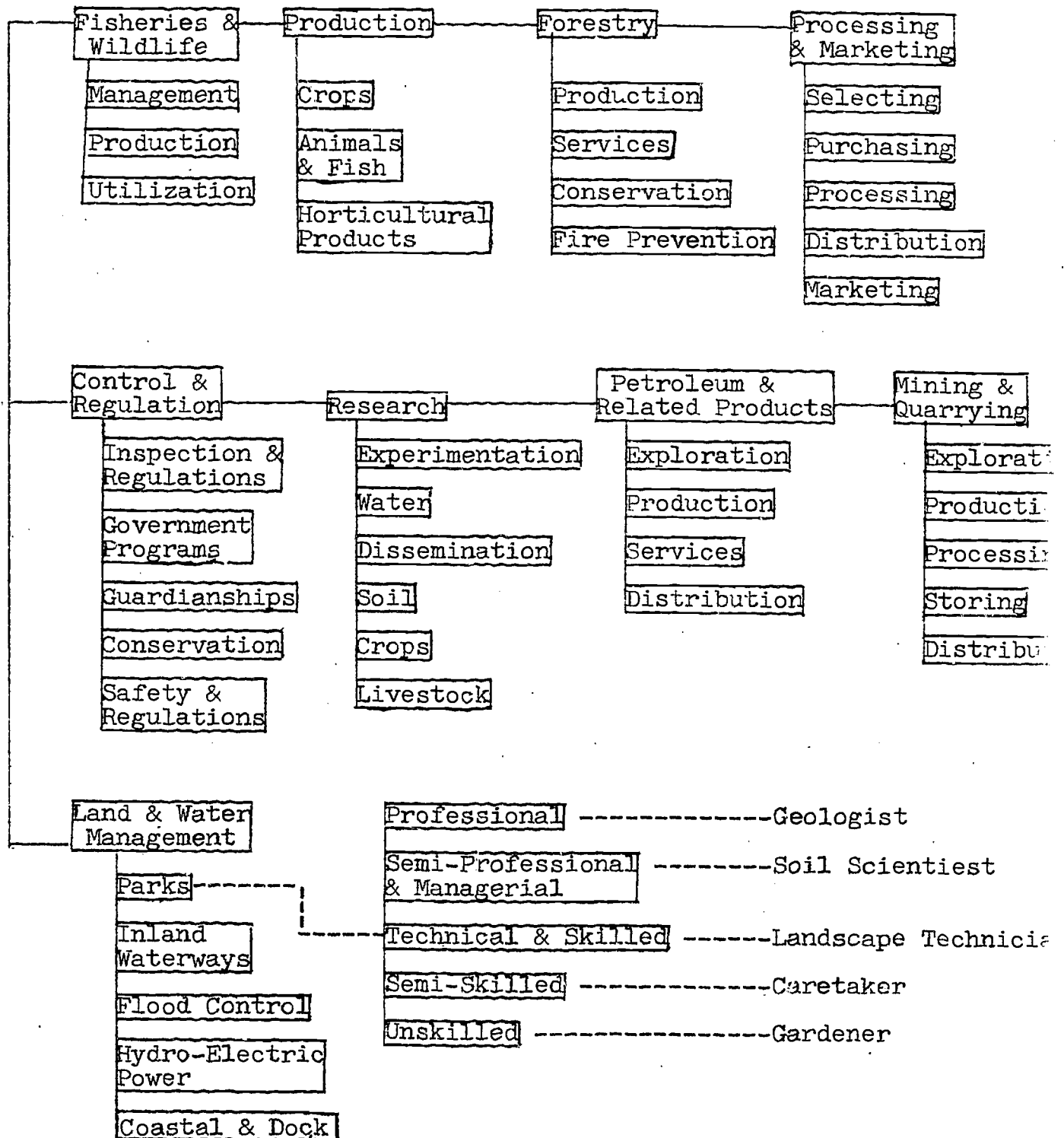
Semi-Skilled

Auto Body Repairman
Auto Mechanic
Airline Mechanic
Busdriver
Merchant Seaman
Railroad Telegrapher
Boatswain
Third Mate

Unskilled

taxi Driver
Longshoreman
Stevedores
Track Worker
Chauffeur
Blacksmith
Lubrication Man
Gasoline Station Attendant
Utility Man
Toll Collector

AGRI-BUSINESS AND
NATURAL RESOURCES
OCCUPATIONAL CLUSTER



Simulated or Work Experience for Agri-Business
and Natural Resources Occupational Cluster

- Professional-----Geologist: Gather & classify geological material from surrounding area.
- Semi-Professional and Managerial-----Soil Scientist: Collect, test, and classify soils from surrounding area. Using Cooperative Extension Service for guidance.
- Technical and Skilled--Landscape Technician: Draw and design landscape area for part of the school area.
- Semi-Skilled-----Gardener: Raise & care for plants and flowers in school area. Could use the organic method for this.
- Unskilled-----Caretaker: Care for lawn and grounds at local school and other local civic areas.

AGRI-BUSINESS OCCUPATIONS

Professional

Agricultural Economist
Agricultural Engineer
Crop Scientist
Wildlife Manager
Geologist
County Agent
Soil Scientist

Semi-Professional and Managerial

Agricultural Communications & Public Relation Worker
Rancher
Seismograph Computer
Spectroscopist
Smoke Tester
Air Analyst
Food Technologist

Technical and Skilled

Forest Technician
Dairy Technologist
Dairy Farmer
Coal Miner
Farmer
Inspector
Nurseryman
Tree Surgeon
Butcher
Animal Trainer
Salesman

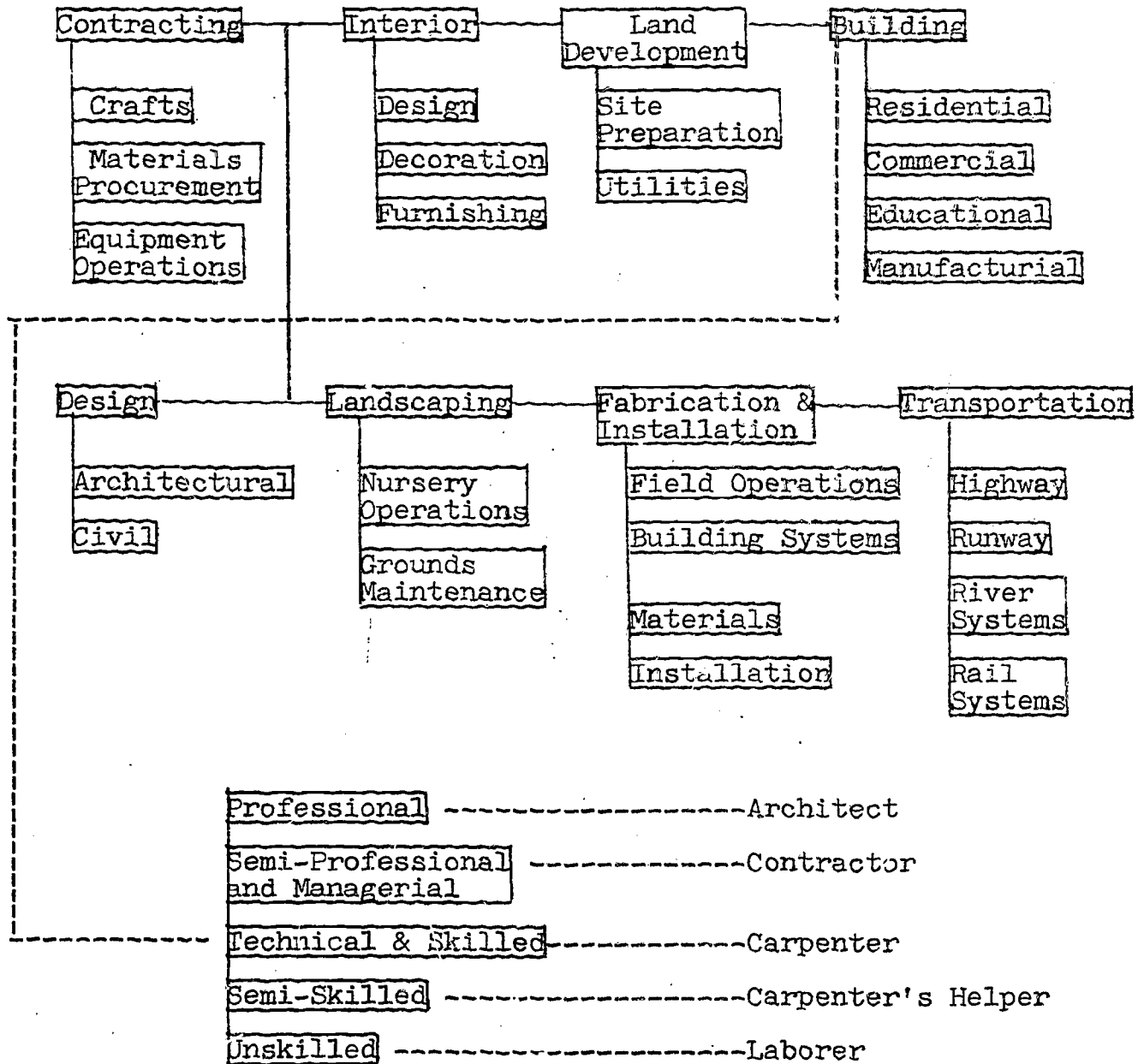
Semi-Skilled

Dairy Industry Worker
Mining Worker
Game Warden

Unskilled

Cowboy
Farm Laborer
Meat Packer
Saw Mill Worker
Poultryman
Gardener
Greenskeeper
Logger

CONSTRUCTION OCCUPATIONAL CLUSTER



Simulated or Work Experience for
Construction Occupational Cluster

- Professional-----Architect: Draw plans with specifications for local facilities.
- Semi-Professional
and Managerial-----Building Contractor: Gather information on material costs and estimate total costs of specific building.
- Technical and Skilled-----Carpenter: Construct table or bookcase for career project materials relevant to that particular need.
- Semi-Skilled-----Carpenter Helper: Assist the carpenter in all of his functions.
- Unskilled-----Laborer: Help semi-skilled and skilled workers in their different construction occupations.

CONSTRUCTION OCCUPATIONS

Professional

Civil Engineer
Architect
Aeronautical Engineer

Semi-Professional and Managerial

Building Contractor
Surveyor
Draftsman

Technical and Skilled

Cost Estimator
Salesman of Materials
Building/site Inspector
Engineering Assistant
Foreman
Carpenter
Plumber
Electrician
Pipefitter
Riveter
Brick Mason
Iron/structural Steel Worker
Roofer
Glazier
Stone Mason
Welder
Machinery Operator
Plasterer

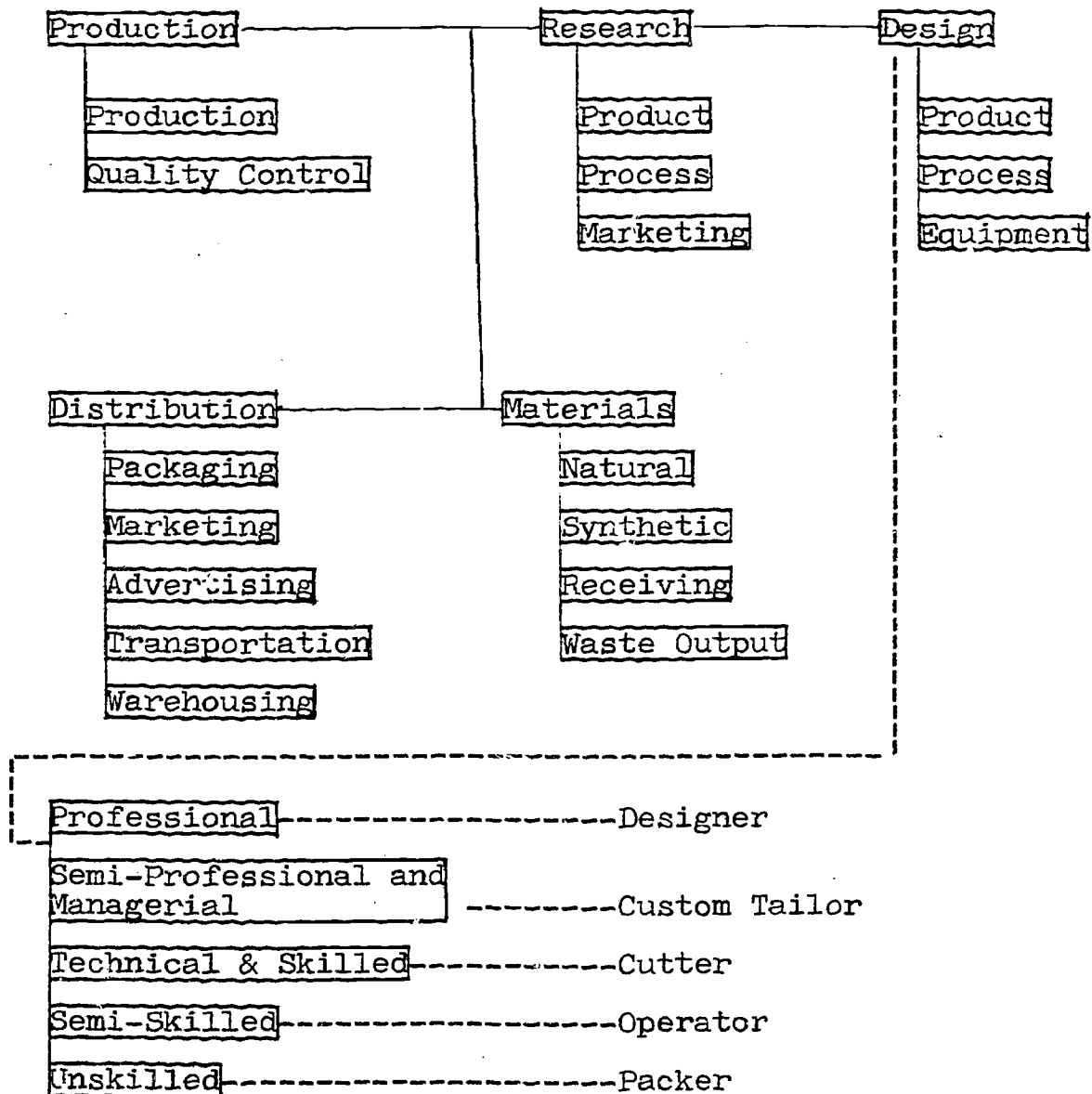
Semi-Skilled

Bricklayers Tender
Oiler
Greaser
Paperhanger
Diesel Mechanic
Construction Helpers
Floor Covering Installers

Unskilled

Laborer
Scaffoldman
Hod Carrier
Rigger

MANUFACTURING
OCCUPATIONAL CLUSTER



Simulated or Work Experience for Manufacturing
Occupational Cluster

Professional-----Fashion Designer:	Design clothes in home economic class.
Semi-Professional and Managerial-----Custom Tailor:	Make special garments to order which has been designed in the class.
Technical and Skilled-----Cutter:	Cut material from patterns which have been designed before hand.
Semi-Skilled-----Operator:	Sewing cloth together which has been cut and numbered before hand. Could set up an assembly hand type of operation to speed up production.
Unskilled-----Packer:	Fold, pack and label the garments which have been made in class.

MANUFACTURING OCCUPATIONS

Professional

Industrial Designer
Industrial Engineer
Industrial Manager
Fashion Designer
Interior Designer
Draftsman
Engineer's

Semi-Professional and Managerial

Air Conditioning Engineer
Atomic Energy Technician
Chemical Technician
Space Analyst
Buyer
Seller
Industrial and Labor Relations Worker
Industrial Hygienists

Technical and Skilled

Air Conditioning Technician
Millwright
Machinist
Lathers
Foreman
Boilermaker
Mechanic
Welder
Cement Mason
Custom Tailor
Dressmaker
Inspector
Pattern Maker
Sign Designer
Toy Designer
Upholsterers
Electroplaters
Electricians
Machine Operators
Mechanic
Instrument Repairman

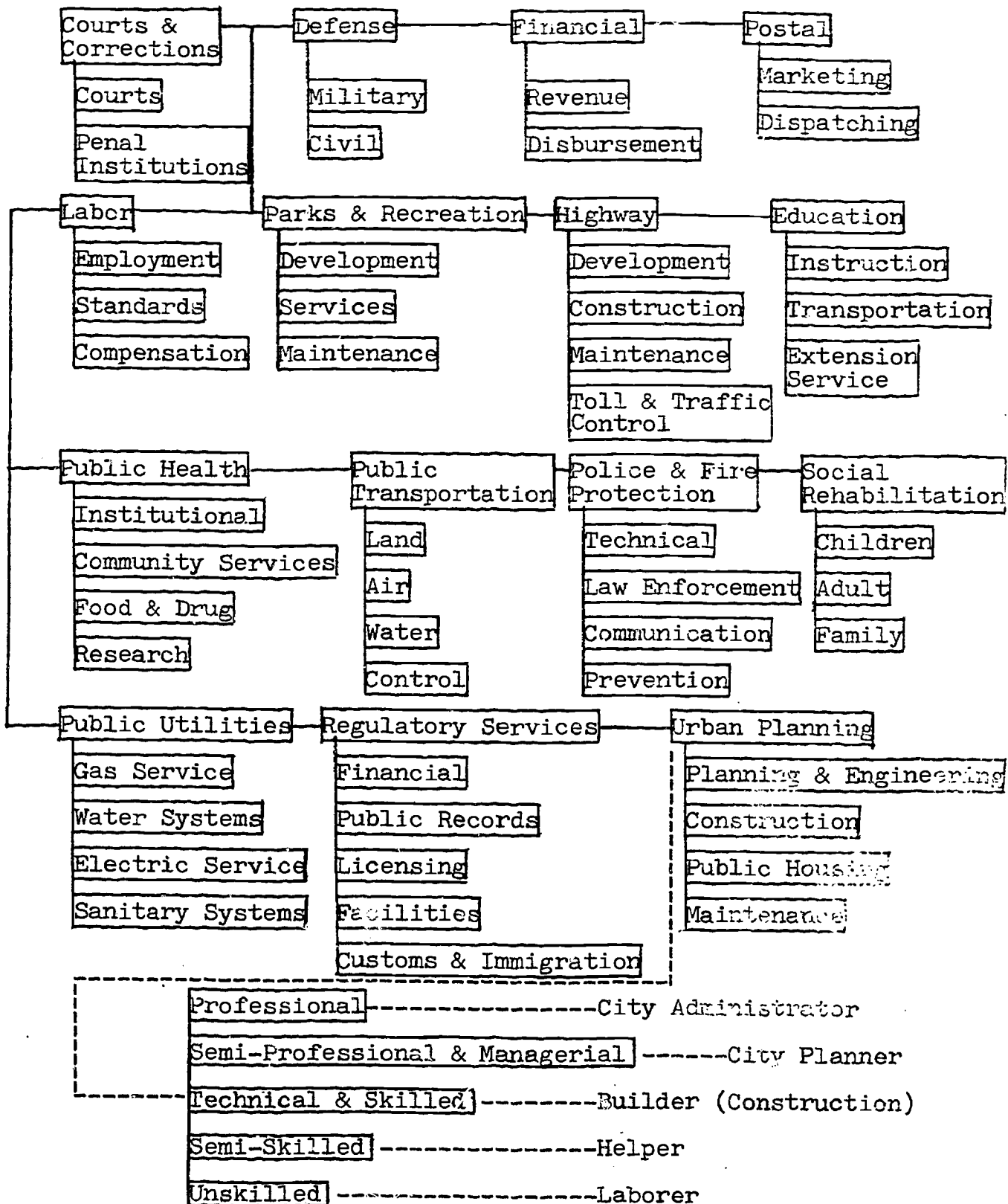
Semi-Skilled

Asbestos & Insulation Worker
Assemblers
Structural Workers
Die Maker
Tool Maker
Repairman
Iron & Steel Worker
Leather Mfg. Worker
Sheet Metal Worker
Machine Operator
Pipefitter
Plumber
Seamstress
Gunsmith
Blacksmith

Unskilled

Assembly Worker
Book Binder
Yardage Caller
Canning Worker
Dry Cleaning Worker
Warehouse Checker
Shipping Clerk
Receiving Clerk
Laborers
Maintenance Helper
Snipper

PUBLIC SERVICE
OCCUPATIONAL CLUSTER



Simulated or Work Experience for Public Service
Occupational Cluster

Professional-----City Administrator:	Plan and conduct activities such as meetings which would be similiar to those of a city.
Semi-Professional-----City Manager: and Managerial	Responsible for carrying out or seeing that the responsibilities are done.
Technical and Skilled-----City Planner:	Design things to improve the city or area where the school is located.
Semi-Skilled-----Technician:	Do things to improve the looks of the area that has been designed by others. Such as cleaning up local parks.
Unskilled-----Laborer:	Helping to see that everything is done by actual on job experience.

PUBLIC SERVICE OCCUPATIONS

Professional

City Administration
Sociologist
Counselor
Judge
Psychometricist
College Administrator
City Manager
Occupational Therapist
Parole Worker
Political Scientist
Secret Service Agent
School Superintendent

Semi-Professional and Managerial

Teacher
Social Worker
City Manager
Cooperative Extension Worker
Guidance Counselor
Internal Revenue Agent
Safety Engineer
Speech Correctionist

Technical and Skilled

Custom Inspector
Civil Service Worker
Policeman
Mailing Supervisor
Shipper
Fire Warden
Fireman
City Planner

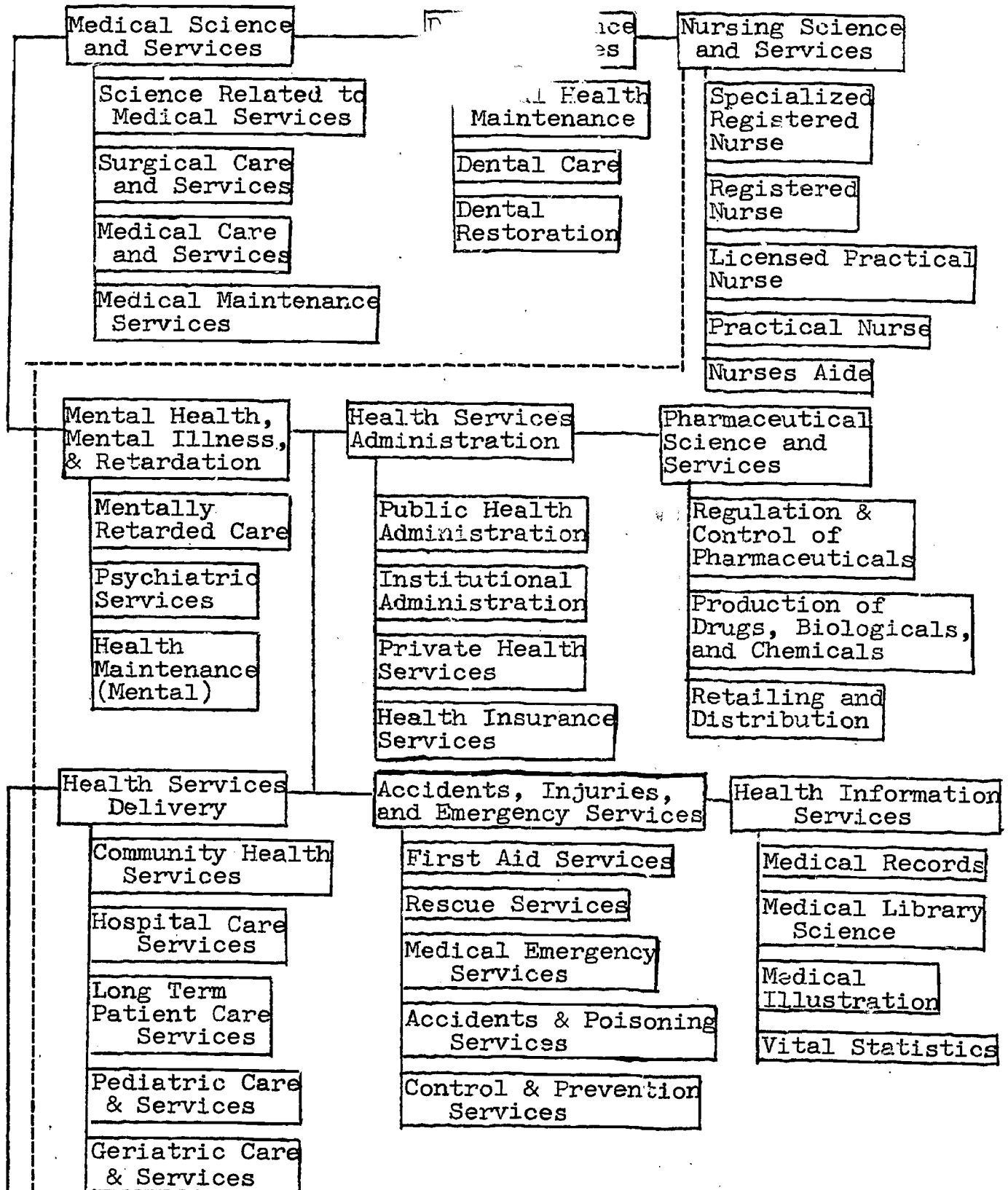
Semi-Skilled

Postal Clerk
Guards
Sheriff
Rural Mail Carrier
Meter Reader
Technician

Unskilled

Mail Sorter
Alarm System Worker
Watchman
Washroom Attendant
Garbage Collector
Laborer

HEALTH OCCUPATIONAL CLUSTER



Health Occupational Cluster Continued

Biologic Science
and Technology

Bio-Medical
Electronics
Technology

Biology

Bio-Chemistry

Bio-Physics

Professional-----Dietitian

Semi-Professional-----Registered Nurse
and Managerial

Technical & Skilled-----Practical Nurse

Semi-Skilled-----Nursing Aid

Unskilled-----Orderly

Simulated or Work Experiences for Health
Occupational Cluster

Professional-----Dietitian:	Help with the management and food service activities of the school cafeteria.
Semi-Professional and Managerial-----Registered Nurse:	Work with the county health nurse in the administrative area's relating to primary students health records.
Technical and Skilled-----Practical Nurse:	Visit on a weekly basis an elderly person in the community where they could care in general for the person's welfare.
Semi-Skilled-----Nursing Aid:	Work with the kindergarten children.
Unskilled-----Orderly:	Help keep things clean in the kindergarten.

HEALTH OCCUPATIONS

Professional

Hospital Administrator
Surgeon
Physician
Dentist
Veterinarian
Nursing Administrator
Ph.

Semi-Professional and Managerial

Dietitian
Registered Nurse
Public Health Sanitarian
Social Worker
Speech & Hearing Therapist
Sanitary Engineer
Dental Hygienist

Technical and Skilled

Dental Assistant
Medical Illustrator
Medical Record Librarian
Medical Secretary
Radiologist
Medical Technologist
Inhalation Therapist
Licensed Practical Nurse

Semi-Skilled

Laboratory Technician
Laboratory Assistant
Practical Nurse
Personnel Workers
Ambulance Attendant

Unskilled

Nursing Aide
Orderly
Janitor
Garbageman
Ambulance Driver

FINE ARTS & HUMANITIES
OCCUPATIONAL CLUSTER

Fine Arts

Humanities

Creating

Creative Writing

Performing

Language

Artist
Management

History

Visual & Graphic
Designing

Media

Performing Arts
Designing

Performing Arts
Productions

Professional

Actor-Actress

Semi-Professional
and Managerial

Interior Designer

Technical & Skilled

Sound Technician

Semi-Skilled

Property Aide

Unskilled

Stage Hand

Simulated or Work Experience for Fine Arts
and Humanities Occupational Cluster

Professional-----Actor-Actress:	Act in class or school productions. Take part in civic productions.
Semi-Professional and Managerial-----Interior Designer:	Plan, design and decorate the interior of school classrooms, teachers lounge, or students individual room in their own residence.
Technical and Skilled----Sound Technician:	Setting up different audio-visual equipment for different school activities to ensure the best sound possible.
Semi-Skilled-----Property Aide:	Obtaining and taking care of different types of equipment used in school activities.
Unskilled-----Stage Hand:	Make sure that everything is in its proper place for school activities.

FINE ARTS AND HUMANITIES OCCUPATIONS

Professional

Conductor
Band Director
Curator
Instrumentalist
Composer
Opera & Concert Singer
Ballet Dancer
Artist
Producer
Playwrite
Actors
Actress
Director

Semi-Professional and Managerial

Teacher
Dancer
Film Writer
Singer
Interior Designer
Scriptwriter
Free Lance Writer
Linguisticist

Technical and Skilled

Cheeriographer
Film Editor
Photographer
Fashion Designer
Commercial Artist
Cartoonist
Set Designer
Technicians

Semi-Skilled

Cameramen
Assistant Technicians
Instrument Tuner
Property Aide

Unskilled

Stagehand
Usher

ENVIRONMENTAL OCCUPATIONAL CLUSTER

Development and Control of Physical Man Made Environment

Civil Technology
Processes

Noise Abatement
& Control

Solid Waste
Pollution Abatement
& Control

Urban Planning

Urban Development
& Renewal

Rural Development

Ornamental
Horticulture

Soil & Mineral Conservation & Control

Collection Data
& Analysis &
Processing

Utilization
Control

Research &
Experimentation

Soil Management

Mineral Extraction

Water Resource Development, Conservation & Control

Recreation
Development
and Management

Utilization
Control

Research &
Experimentation

Water Pollution
Abatement &
Control

Civil Technology
Processes

Forest, Range, Shore & Wildlife Conservation and Control

Resource Protection

Utilization Control

Research and
Experimentation

Resource Survey
and Monitoring

Resource Development

Environmental Health Services

Assessment

Maintenance

Services

Administration

Space and Atmospheric Monitoring & Control

Research and
Experimentation

Air Pollution
Abatement & Control

Meteorological
Processes

Utilization Control

Professional

-----Botanist

Semi-Professional
& Managerial

-----Park Ranger

Technical & Skilled

-----Tree Surgeon

Semi-Skilled

-----Tree Trimmer

Unskilled

-----Forestry Aid

Simulated or Work Experience for
Environmental Occupational Cluster

- Professional-----Botanist: Study and classify plant life in the area and how these affect ecological balance of nature.
- Semi-Professional and-----Park Ranger: Help manage recreational facilities of the school
Managerial Could promote campaign to help prevent forest fires and stop litter. Work with civic people in keeping America beautiful.
- Technical and Skilled-----Tree Surgeon: Could assist local citizens in care and management of trees in the protection against insects and pests. Work with local conservation officials.
- Semi-Skilled-----Tree Trimmer: Work with local citizens in doing light tree trimming work.
- Unskilled-----Forestry Aid: Help map and blaze out nature trail by working with local forestry officials.

ENVIRONMENTAL OCCUPATIONS

Professional

City Planner
Ecologist
Geologist
Geo-Physicist
Oceanographer
Physicist
Chemist
Astronomer
Paleontologist
Biochemist
Meteriologist
Botanist
Zoologist
Geneticist
Anthropologist
Landscape Architect

Semi-Professional and Managerial

Park Ranger
Forester
Game Warden
Conservationist

Technical and Skilled

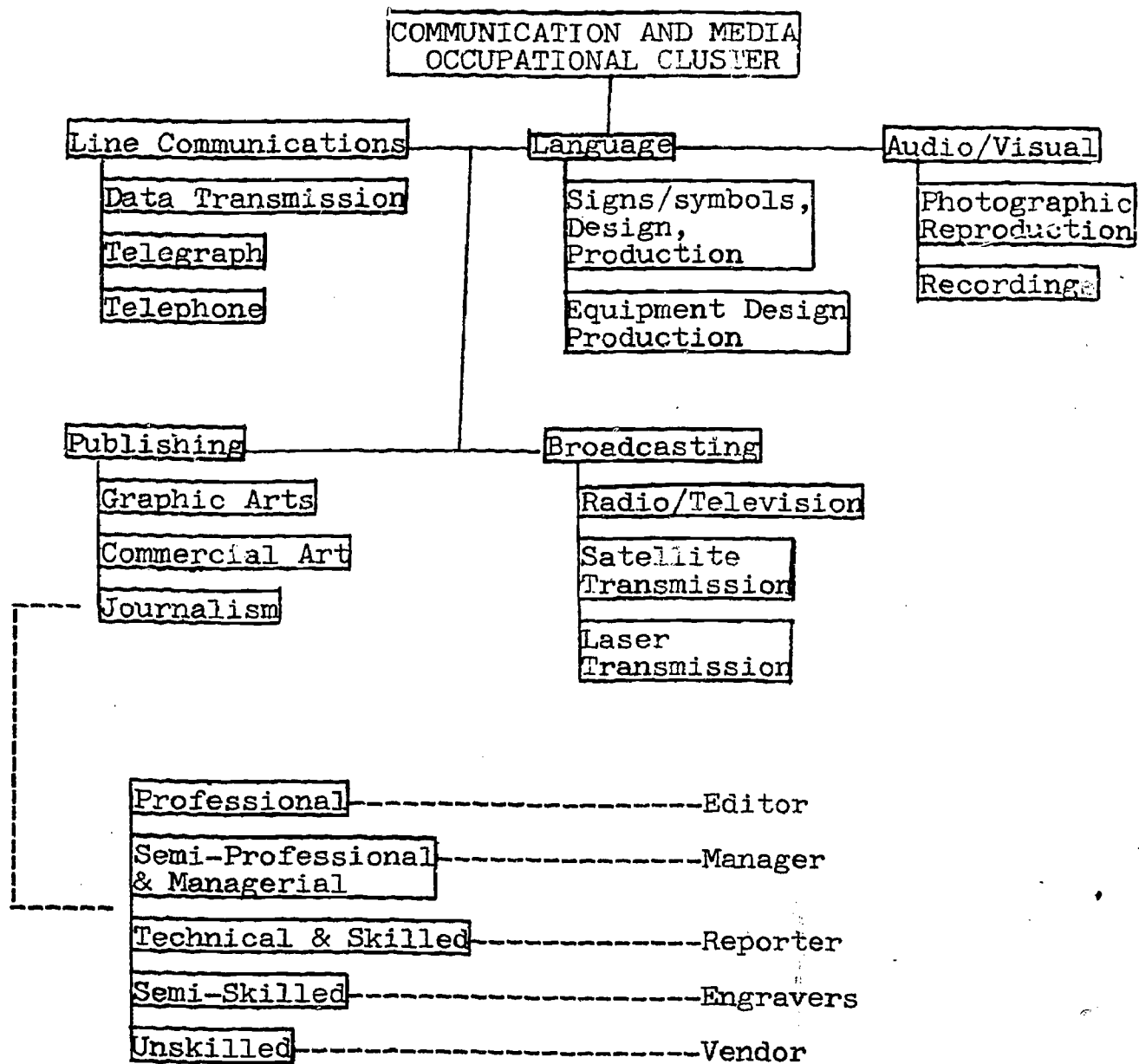
Technician
Science Writer
Technical Writer
Fire Fighters (Forest)
Tree Surgeon

Semi-Skilled

Tree Trimmer
Wildlike Manager
Fisherman
Lumberman
Pest Control Operators

Unskilled

Animal Keeper
Forestry Aides



Simulated or Work Experience for Communication
and Media Occupational Cluster

Professional-----Editor:	Responsible for producing school paper.
Semi-Professional-----Manager: and Managerial	Assigning different work roles to people involved in gathering the news.
Technical and Skilled-----Reporter:	Writing up news as you observed it in your assigned role.
Semi-Skilled-----Pressman:	Running paper off school press.
Unskilled-----Vendor:	Selling school paper.

COMMUNICATION MEDIA OCCUPATIONS

Professional

Producer
Director
Editor (film & paper)
Actors
Actress

Semi-Professional and Managerial

Radio-Television Announcer
Reporter
Program Director
Public Affairs Director
Journalist
Artist

Technical and Skilled

Broadcast Technician
Cable Splicer
Operator
Lineman
Disk Jockey
Photographer
Audio Engineer
Cameraman

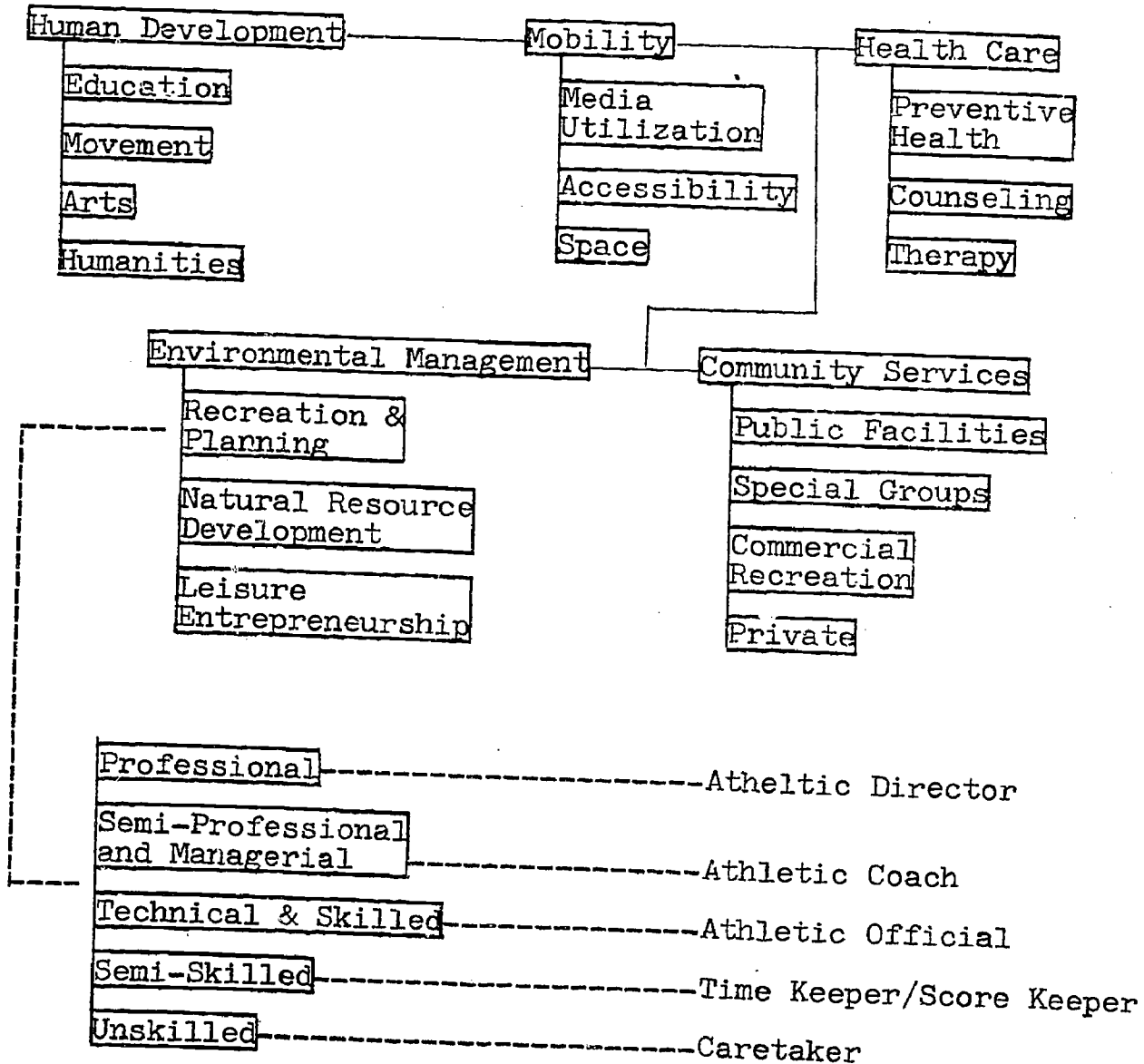
Semi-Skilled

Compositors
Printing Pressman
Copywriters
Telephone Installers
Telephone Operators
Teletype Operators
Radio-Television Serviceman
Jobber
Lay Out Man
Morse Operator
Telefax Clerk
Engravers
Typesetters
Projectionist

Unskilled

Newspaper Vendor
Newspaper Carrier
Public Utilities Worker
Wardrobe Mistress
Drop Man
Wirephoto Operator

HOSPITALITY AND RECREATION OCCUPATIONAL CLUSTER



Simulated or Work Experience for Hospitality
and Recreation Occupational Cluster

Professional-----	Athletic Director:	Set up supervised play activities with elementary students.
Semi-Professional ----- and Managerial	Athletic Coach:	Coach team of students in activities that are being conducted.
Technical and Skilled----	Athletic Official:	Call the sport activities or referee the activity.
Semi-Skilled-----	Score Keeper:	Keep accurate report of the activity that is being done.
Unskilled-----	Caretaker:	Take care of the area where the activity is taking place. Both before and after the activity.

HOSPITALITY AND RECREATION OCCUPATIONS

Professional

Professional Athletics
Athletic Coaches
Hotel Managers
Motel Managers
Chef
Athletic Director

Semi-Professional and Managerial

Restaurant Manager
Theater Manager
Instructor
Athletic Director
Travel Counselor
Salesman

Technical and Skilled

Superintendent of Services
Tourist Director
Bar Tender
Receptionist
Cook
Florist

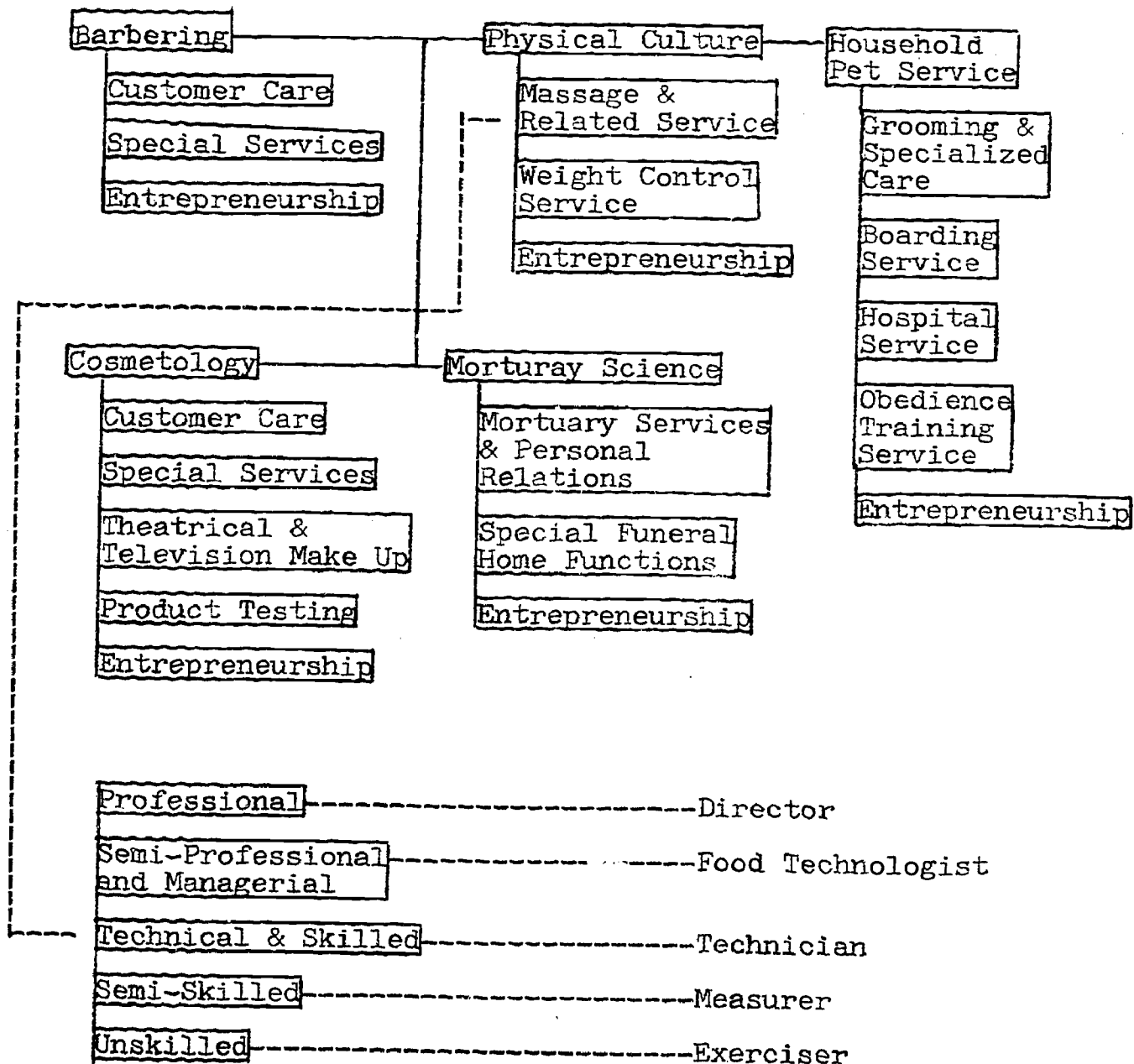
Semi-Skilled

Travel Clerk
Desk Clerk
Camp Counselor
Wine Steward
Hotel-Motel Workers
Motion Picture Projectionists
Bell Captain
Hostess
Waiter Captain
Carver
Charwomen
Chamber Maid
Time Keeper/Score Keeper

Unskilled

Camera Girl
Elevator Operator
Grounds Keeper
Gardener
Maid
Doorman
Bus Boy
Waiter-Waitress
Caddy
Car Hop
Dishwasher
Bellman
Rack Clerk
Key Clerk
Mail Clerk
Red Cap

PERSONAL SERVICE
OCCUPATIONAL CLUSTER



Simulated or Work Experience for Personal
Service Occupational Cluster

- Professional-----Director: Set up weight control clinic and general health care clinic in the school for any student who would care to enroll.
- Semi-Professional and Managerial-----Food Technologist: Plan talks and demonstrations concerning foods to eat and still maintain a balanced meal..
- Technical and Skilled-----Technician: Discuss and show methods of avoiding skin conditions by not eating proper types and amounts of food.
- Semi-Skilled-----Measurer: Practice weighing the proper amount of food so that human body gets the right amount of calories.
- Unskilled-----Exerciser: Lead group in certain basic exercises to keep muscles in tone and in shape.*

* All of the above should work closely with the home economics teacher and county health nurse.

PERSONAL SERVICE OCCUPATIONS

Professional

Rabbi
Clergyman
Priest
Criminologist
Lawyer
Director
Mortician
Veterinarian

Semi-Professional and Managerial

Detective
Funeral Director
Manager
Food Technologist

Technical and Skilled

Barber
Beautician
Governess
Upholsterer
Photographer
Embalmer
Investigator
Technician
Animal Trainer

Semi-Skilled

Waiter
Waitress
Shoe Repairman
Watch Repairman
Butler
Home Appliance Serviceman
Office Machine Serviceman
Cemetery Manager
Repair Estimator
Manicurist
Wig Dresser
Masseur
Bailiff
Measurer

Unskilled

Service Station Attendant
Houseman
Caretaker
Parking Attendant
Grave Digger
Laundry Worker
Valet
Baggageman
Ironer
Presser
Exerciser